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Property values tagged with IC are from the ${\tt ZIC/VINITI}$ data file provided by ${\tt InfoChem.}$

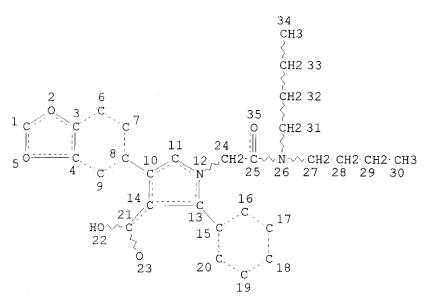
STRUCTURE FILE UPDATES: 30 AUG 2004 HIGHEST RN 736108-36-4 DICTIONARY FILE UPDATES: 30 AUG 2004 HIGHEST RN 736108-36-4

TSCA INFORMATION NOW CURRENT THROUGH MAY 21, 2004

Please note that search-term pricing does apply when conducting SmartSELECT searches.

Crossover limits have been increased. See HELP CROSSOVER for details.

Experimental and calculated property data are now available. For more information enter HELP PROP at an arrow prompt in the file or refer to the file summary sheet on the web at: http://www.cas.org/ONLINE/DBSS/registryss.html



NODE ATTRIBUTES:

CONNECT IS E2 RC AT 1 CONNECT IS E2 RC AT 6 CONNECT IS E2 RC AT 7 CONNECT IS E2 RC AT 9 CONNECT IS E2 RC AT 16 CONNECT IS E2 RC AT 17 CONNECT IS E2 RC AT 18 CONNECT IS E2 RC AT 19 CONNECT IS E2 RC AT 20 CONNECT IS E1 RC AT 23
DEFAULT MLEVEL IS ATOM
DEFAULT ECLEVEL IS LIMITED

GRAPH ATTRIBUTES:
RSPEC 12 15 8
NUMBER OF NODES IS 35

STEREO ATTRIBUTES: NONE

L8 1 SEA FILE=REGISTRY SSS FUL L6

=> d ide

L8 ANSWER 1 OF 1 REGISTRY COPYRIGHT 2004 ACS on STN

RN 178608-57-6 REGISTRY

CN 3-Pyrrolidinecarboxylic acid, 4-(1,3-benzodioxol-5-yl)-1-[2-(dibutylamino)-2-oxoethyl]-2-phenyl-, (2R,3R,4S)-rel- (9CI) (CA INDEX NAME)
OTHER CA INDEX NAMES:

CN 3-Pyrrolidinecarboxylic acid, $4-(1,3-benzodioxol-5-yl)-1-[2-(dibutylamino)-2-oxoethyl]-2-phenyl-, <math>(2\alpha,3\beta,4\alpha)-$

FS STEREOSEARCH

MF C28 H36 N2 O5

SR CA

LC STN Files: CA, CAPLUS, TOXCENTER, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

Relative stereochemistry.

PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT

6 REFERENCES IN FILE CA (1907 TO DATE)

6 REFERENCES IN FILE CAPLUS (1907 TO DATE)

=> b home

FILE 'HOME' ENTERED AT 09:02:01 ON 01 SEP 2004

=>

=> b hcaplus FILE 'HCAPLUS' ENTERED AT 11:06:16 ON 01 SEP 2004 USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT. PLEASE SEE "HELP USAGETERMS" FOR DETAILS. COPYRIGHT (C) 2004 AMERICAN CHEMICAL SOCIETY (ACS)

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FILE COVERS 1907 - 1 Sep 2004 VOL 141 ISS 10 FILE LAST UPDATED: 31 Aug 2004 (20040831/ED)

This file contains CAS Registry Numbers for easy and accurate substance identification.

'OBI' IS DEFAULT SEARCH FIELD FOR 'HCAPLUS' FILE

=> d que 19 nos

Ь6 STR

 $\Gamma8$ 1 SEA FILE=REGISTRY SSS FUL L6

L96 SEA FILE=HCAPLUS ABB=ON PLU=ON L8

=> d ibib abs hitstr 19 1-6

ANSWER 1 OF 6 HCAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 2002:171682 HCAPLUS

DOCUMENT NUMBER: 136:232311

TITLE: Preparation of 4-benzoheterocyclyl-1-

aminocarbonylmethylpyrrolidine-3-carboxylic acid

derivatives as endothelin antagonists

INVENTOR(S): Winn, Martin; Boyd, Steven A.; Hutchins, Charles W.;

Hwan-Soo, Jae; Tasker, Andrew S.; Von Geldern, Tomas

W.; Kester, Jeffrey; Sorensen, Bryan K.;

Szczepankiewicz, Bruce G.; Henry, Kenneth; Liu, Gang; Wittenberger, Steven J.; King, Steven A.; Janus, Todd

J.; Padley, Robert J.

Abbott Laboratories, USA PATENT ASSIGNEE(S):

SOURCE: PCT Int. Appl., 817 pp.

CODEN: PIXXD2 Patent

DOCUMENT TYPE:

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2002017912	A1	20020307	WO 2001-US27220	20010831

W: CA, JP, MX

RW: AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL,

-PT, SE, TR

PRIORITY APPLN. INFO.:

US 2000-653563 A 20000831

OTHER SOURCE(S): GT

MARPAT 136:232311

Title compds. [I; n = 0; Z = CH2; R = CO2H; R1 = alkoxyaryl, AΒ alkoxyalkoxyaryl, heterocyclylalkyl; R2 = 1,3-benzodioxyl, 4-benzofuranyl, 5-indanyl; R3 = R4R5CO; R4 = R6R7N, R8R9NNH; R5 = methylene; one of R6, R7 is H, the other is arylalkyl, diarylalkyl; one of R8, R9 is alkyl, the other is aryl] stereoisomers, and pharmaceutically acceptable salts are prepared as endothelin antagonists. Thus, the title compound II was prepared from Et (4-methoxybenzoyl) acetate, 5-(2-nitrovinyl)-1,3-benzodioxol, ethyldiisopropylamine, and N-Pr bromoacetamide and was in vitro tested for binding effect to the endothelin receptor and the determination of title compound as

ΙI

functional ET antagonist.

ΙT 178608-57-6P

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES

(preparation of 4-benzoheterocyclyl-1-aminocarbonylmethylpyrrolidine-3carboxylic acid derivs. as endothelin antagonists)

178608-57-6 HCAPLUS RN

3-Pyrrolidinecarboxylic acid, 4-(1,3-benzodioxol-5-yl)-1-[2-(dibutylamino)-CN 2-oxoethyl]-2-phenyl-, (2R,3R,4S)-rel- (9CI) (CA INDEX NAME)

Relative stereochemistry.

REFERENCE COUNT:

4 THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L9 ANSWER 2 OF 6 HCAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

2000:891585 HCAPLUS

DOCUMENT NUMBER:

134:42122

TITLE:

Preparation of substituted pyrrolidine-3-carboxylic

acids as endothelin antagonists

INVENTOR(S):

Winn, Martin; Boyd, Steven A.; Hutchins, Charles W.; Jae, Hwan-soo; Tasker, Andrew S.; Von Geldern, Thomas

W.; Kester, Jeffrey A.; Sorensen, Bryan K.;

Szczepankiewicz, Bruce G.; Henry, Kenneth J.; Liu,

Gang; Wittenberger, Steven J.; King, Steven A.

PATENT ASSIGNEE(S):

SOURCE:

Abbott Laboratories, USA

U.S., 587 pp., Cont.-in-part of U.S. Ser. No. 794,506.

CODEN: USXXAM

DOCUMENT TYPE:

LANGUAGE:

Patent English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

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	6162						2000	1219			997-				1	- 9970	804	
US	5767						1998	0616		US 1	995-	4425	75		1	9950	530	
ZA	9701	179			Α		1998	0115		ZA 1	997-	1179			1	9970	212	
	5141	. —					2003			NZ 1	997-	5141	71		1	9970.	212	
WO	9906	397			A2		1999	0211		WO 1	998-	US15	479		1	9980	727	
WO	9906	397			А3		1999	1209										
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							GE,											
		KΡ,	KR,	KΖ,	LC,	LK,	LR,	LS,	LT,	LU,	LV,	MD,	MG,	MK,	MN,	MW,	MX,	
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ΕP	1003																	
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m D	2000		FI,				0000	1001		0.								
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	2001										000-5					9980		
RK	98152	296			А		2001:	1120]	BR 19	998-1	15296	5		19	99801	727	

TR 200101233 TR 200101234 NZ 502395 ZA 9806908 TW 552260 NO 2000000542 MX 200001283 BG 104216 US 6462194 US 6380241 PRIORITY APPLN. INFO.:	T2 T2 A A B A A B1 B1	20020621 20020828 19990426 20030911 20000404 20001030 20001229 20021008 20020430	TR NZ ZA TW NO MX BG US	1998-6908	B2 A2 B2 B2 A2	19980727 19980727 19980727 19980731 19980810 20000202 20000204 20000302 20000515 20001117 19940819 19941104 19950530 19950802 19960213 19970204 19970212 19970804 19980327
OTHER SOURCE (S).	147 D D 7 m	104 40100			••	10000121

OTHER SOURCE(S): GI

MARPAT 134:42122

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AB The title compds. {I; Z = CR18R19, CO (wherein R18, R19 = H, alkyl); n = 0-1; R = (CH2)mW [m = 0-6; W = CO2G (G = H, a carboxy protecting group), PO3H2, CN, etc.]; R1, R2 = H, alkyl, alkenyl, etc.; R3 = -R5COR4, -NR6R5COR4, -R7SO2R6, etc. [R5 = a bond, alkylene, alkenylene, etc.; R4, R6 = NR11R12 (R11, R12 = H, alkyl, haloalkyl, etc.), alkyl, alkenyl, etc.; R7 = a bond, alkylene, alkenylene, etc.]}, useful for antagonizing endothelin, were prepared and formulated. E.g., a multi-step synthesis of trans,trans-II which showed 96.4% endothelin A inhibition at 1 μ M, was given.

IT 178608-57-6P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of substituted pyrrolidine-3-carboxylic acids as endothelin antagonists)

RN 178608-57-6 HCAPLUS

CN 3-Pyrrolidinecarboxylic acid, 4-(1,3-benzodioxol-5-yl)-1-[2-(dibutylamino)-2-oxoethyl]-2-phenyl-, (2R,3R,4S)-rel- (9CI) (CA INDEX NAME)

Relative stereochemistry.

REFERENCE COUNT:

THERE ARE 27 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L9 ANSWER 3 OF 6 HCAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

1999:113673 HCAPLUS

DOCUMENT NUMBER:

130:182352

TITLE:

Preparation of substituted pyrrolidine-3-carboxylic

acids as endothelin antagonists

INVENTOR(S):

Winn, Martin; Boyd, Steven A.; Hutchins, Charles W.;

Jae, Hwan-Soo; Tasker, Andrew S.; Von Geldern, Thomas

W.; Kester, Jeffrey A.; Sorensen, Bryan K.;

Szczepankiewicz, Bruce G.; Henry, Kenneth J.; Liu,

Gang; Wittenberger, Steven J.; King, Steven A.

PATENT ASSIGNEE(S):

SOURCE:

Abbott Laboratories, USA

PCT Int. Appl., 821 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

LANGUAGE:

Patent English

FAMILY ACC. NUM. COUNT:

5

PATENT INFORMATION:

PAS	CENT	NO.			KIN	D	DATE		APPLICATION NO.						DATE		
WO	9906	397			A2	_	1999	0211		WO 1	 998-	 US15	 479		19980727		
WO	9906	397			А3		1999	1209							_		, _ ,
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		DK,	EE,	ES,	FI,	GB,	GE,	GH,	GM,	HR,	HU,	ID,	IL,	IS,	JP,	KE.	KG.
		ΚP,	KR,	ΚZ,	LC,	LK,	LR,	LS,	LT,	LU,	LV,	MD,	MG,	MK,	MN,	MW,	MX,
		NO,	NΖ,	PL,	PT,	RO,	RU,	SD,	SE,	SG,	SI,	SK,	SL,	ТJ,	TM,	TR,	TT,
		UA,	ŬG,	UZ,	VN,	YU,	ZW,	AM,	ΑZ,	BY,	KG,	ΚZ,	MD,	RU,	TJ,	TM	
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		FI,	FR,	GB,	GR,	ΙE,	ΙΤ,	LU,	MC,	NL,	PT,	SE,	BF,	ВJ,	CF,	CG,	CI,
		CM,	GΑ,	GN,	GW,	ML,	MR,	ΝE,	SN,	TD,	TG						
	6162	. — .			Α		2000	1219		US 19	997-	9059:	13		19	9970	304
		921			A1		1999	0222		AU 19	998-	8592	1		19	980'	727
	7484						2002										
EΡ	1003						2000									980	
	R:	AT,	BE,	CH,	DE,	DK,	ES,	FR,	GB,	GR,	IT,	LI,	LU,	NL,	SE,	PT,	ΙE,

SI, FI, RO						
JP 2001512119	Т2	20010821	JP	2000-505155		19980727
BR 9815296	Α	20011120	BR	1998-15296		19980727
NZ 502395	A	20020828	ΝZ	1998-502395		19980727
NO 200000542	A	20000404	NO	2000-542		20000202
MX 200001283	A	20001030	MX	2000-1283		20000204
BG 104216	A	20001229	BG	2000-104216		20000302
PRIORITY APPLN. INFO.:			US	1997-905913	А	19970804
			US	1998-48955	Α	19980327
			US	1994-293349	В2	19940819
			US	1994-334717	B2	19941104
			US	1995-442575	A2	19950530
			US	1995-497998	В2	19950802
			US	1996-600625	B2	19960213
				1997-794506	A2	19970204
OTHER COURCE/C)		. 100 100050	WO	1998-US15479	W	19980727

OTHER SOURCE(S): MARPAT 130:182352

AΒ The title compds. [I; Z = CR18R19, C(0) (wherein R18, R19 = H, lower alkyl); n = 0-1; R = CN, OH, alkoxy, etc.; R1, R2 = H, lower alkyl, alkenyl, etc.; R3 = R4C(0)R5-, R4R5a-, R4C(0)R5NR6- (wherein R5 = a bond, alkylene, alkenylene, etc.; R5a = alkylene, alkenylene; R4, R6 = H, lower alkyl, haloalkyl, etc.), etc.], useful in treatment of conditions such as hypertension, congestive heart failure, atherosclerosis, etc., were prepared and formulated. E.g., a 4-step synthesis of the title compound trans, trans-II which showed 96.4% inhibition of ETA at 1 μ M, was given.

IΤ 178608-57-6P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of substituted pyrrolidine-3-carboxylic acids as endothelin antagonists)

178608-57-6 HCAPLUS RN

CN 3-Pyrrolidinecarboxylic acid, 4-(1,3-benzodioxol-5-yl)-1-[2-(dibutylamino)-2-oxoethyl]-2-phenyl-, (2R,3R,4S)-rel- (9CI) (CA INDEX NAME)

Relative stereochemistry.

ANSWER 4 OF 6 HCAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1998:414738 HCAPLUS

DOCUMENT NUMBER: 129:95396

TITLE: Preparation of 1-(carbamoylmethyl)pyrrolidine-3-

carboxylates and analogs as endothelin antagonists Winn, Martin; Boyd, Steven A.; Hutchins, Charles W.; Jae, Hwan-Soo; Tasker, Andrew S.; Von Geldern, Thomas

W.; Kester, Jeffrey A.; Sorensen, Bryan K.

PATENT ASSIGNEE(S): Abbott Laboratories, USA

SOURCE: U.S., 109 pp., Cont.-in-part of U.S. Ser. No. 334,717,

abandoned.

CODEN: USXXAM DOCUMENT TYPE:

Patent LANGUAGE:

English FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

INVENTOR(S):

PATENT NO.	KIND DATE	APPLICATION NO.	DATE
US 5767144	A 19980616	5 US 1995-442575	19950530
	A 19970422		19950601
	A 19980324		19950601
CA 2195677	AA 19960229	CA 1995-2195677	19950804
WO 9606095		WO 1995-US9924	19950804
W: AU, CA, JP			
RW: AT, BE, CH	, DE, DK, ES, FR,	GB, GR, IE, IT, LU, MC,	NL, PT, SE
AU 9532137	A1 19960314	AU 1995-32137	19950804
AU 711832	B2 19991021	AU 1995-32137	
EP 776324	A1 19970604	EP 1995-928323	19950804
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JP 10504565	T2 19980506	JP 1995-508101	19950804
EP 1186603	A2 20020313	EP 2001-125462	19950804
	A3 20030709		
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AT 219077	E 20020615	AT 1995-928323	19950804
PT 776324	T 20021129	AT 1995-928323 PT 1995-928323 ES 1995-928323	19950804
ES 2179881	T3 20030201	ES 1995-928323	19950804
IL 114894	A1 20030410	IL 1995-114894	19950810
NZ 514171	A 20031031		19970212
US 6162927	A 20001219		19970804
HK 1008328	A1 20030207	HK 1998-109192	19980715
AU 9920344	A1 19990603	AU 1999-20344	19990310
AU 725122	B2 20001005		

PRIORITY APPLN. INFO.: US 19 US 19 US 19 US 19 AU 19 EP 19 WO 19 US 19 US 19 US 19 US 19	1994-334717 B2 1995-442575 B3 1995-497998 A 1995-32137 A3 1995-928323 A3 1995-US9924 W 1996-600625 B2 1997-794506 A2 1997-503365 A1	20001117 19940819 19941104 19950530 19950802 19950804 19950804 19950804 19960213 19970204 19970212
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OTHER SOURCE(S):

MARPAT 129:95396

GΙ

$$R^2$$
 R^3
 R^3

AB Title compds. [I; R = (CH2)mR4; R1,R2 = H, (un)substituted alkyl, heterocyclyl, aryl, etc.; R3 = acyl(alkyl), etc.; R4 = OH, alkoxy, acyl, heterocyclyl, etc.; Z = CH2, CO, alkylidene; Z1 = bond or CH2; m = 0-6] were prepared Thus, 4-(MeO)C6H4COCH2CO2Et was alkylated by 5-(2-nitrovinyl)-1,3-benzodioxole and the product reductively cyclized to give, in 3 addnl. steps, title compound II. Data for biol. activity of I were given.

IT 178608-57-6P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of 1-(carbamoylmethyl)pyrrolidine-3-carboxylates and analogs as endothelin antagonists)

RN 178608-57-6 HCAPLUS

CN 3-Pyrrolidinecarboxylic acid, 4-(1,3-benzodioxol-5-yl)-1-[2-(dibutylamino)-2-oxoethyl]-2-phenyl-, (2R,3R,4S)-rel- (9CI) (CA INDEX NAME)

Relative stereochemistry.

REFERENCE COUNT:

14 THERE ARE 14 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L9 ANSWER 5 OF 6 HCAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER:

1997:568105 HCAPLUS

DOCUMENT NUMBER:

127:248099

TITLE:

Preparation of benzo-1,3-dioxolyl- and

benzofuranyl-substituted pyrrolidine derivatives as

endothelin antagonists.

INVENTOR(S):

Winn, Martin; Boyd, Steven A.; Hutchins, Charles W.; Jae, Hwan-soo; Tasker, Andrew S.; Von Geldern, Thomas

W.; Kester, Jeffrey A.; Sorensen, Bryan K.;

Szczepankiewicz, Bruce G.; Henry, Kenneth J., Jr.; Liu, Gang; Wittenberger, Steven J.; King, Steven A.

PATENT ASSIGNEE(S):

Abbott Laboratories, USA

SOURCE:

PCT Int. Appl., 682 pp.

CODEN: PIXXD2

DOCUMENT TYPE:

Patent

LANGUAGE:

English

FAMILY ACC. NUM. COUNT:

PATENT INFORMATION:

PA'	PATENT NO.				KIND DATE			APPLICATION NO.						DATE				
WO	97300 พ.								WC JP, F				36		1	99702	212	
									FR, G				Tm	T 11	MC	NIT	D.M.	a E
CA	22455	87	22,	O11,	ΔΔ,	DIC	, <u>55,</u> 1997	0821	CF	10	07.	22455	11,	шυ,	MC,	иь, 0070'	212	ಎ೬
	97226								AU									
	97011								ZA									
	88521								EF									
131																		
CM									GB, G									E.T
	12191	-					1999		CN	1 19	197-	19218	4		1:	39702	212	
CN	10917						2002											
BR	97075	09			Α		1999	0727	BF	19	97-	7509			1:	39702	212	
NZ	33081	8			Α		2000	0526	NZ	19	97-	33081	. 8		1:	99702	212	
JP	20025	0408	31		Т2		2002	0205				52939						
CN	13841	00			А		2002	1211				10462				00202		
PRIORITY	Y APPL								US	19	96-	60062	:5		$\overline{1}$	99602	213	
									US	19	97-	79450	16			99702		
												US193	-			99702		
OTHER SO	OURCE (S):			MARE	TA	127:	24809		. 10		00100			,, T.	,5102	- 1 4	

$$\mathbb{R}^2$$
 \mathbb{Z}
 \mathbb{R}^3
 $\mathbb{C}^{(CH_2)}_n$
 \mathbb{R}^1
 \mathbb{I}

AΒ Title compds. [I; Z = CR18R19, CO; R18, R19 = H, alkyl; n = 0, 1; R =

(CH2) mW; m = 0-6; W = (protected) CO2H, PO3H2, cyano, alkylaminocarbonyl, tetrazolyl, OH, alkoxy, sulfonamido, specified heterocyclyl, etc.; R1 = alkyl, alkenyl, haloalkyl, haloalkoxyalkyl, cycloalkylalkyl, alkylsulfonylamidoalkyl, heterocyclylalkyl, etc.; R2 = H, alkyl, alkenyl, alkynyl, alkoxyalkyl, cycloalkyl, alkoxycarbonylalkyl, hydroxyalkyl, aminocarbonylalkenyl, hydroxyalkenyl, aryloxyalkyl, etc.; R3 = R4COR5, R6SO2R7, etc.; R5, R7 = bond, alkylene, alkenylene, iminoalkylene, etc.; R4, R6 = amino, haloalkyl, cycloalkyl, alkoxyalkyl, arylalkyl, haloalkenyl, haloalkynyl, etc.], were prepared Thus, trans, trans-2-(4methoxyphenyl)-4-(1,3-benzodioxol-5-yl)-1-(N-cyclopropylmethyl-Npropylaminocarbonylmethyl)pyrrolidine-3-carboxylic acid (preparation given) inhibited [1251]ET-1 binding to receptors by 100% at 1 mM.

TΨ 178608-57-6P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of benzo-1,3-dioxolyl- and benzofuranyl-substituted pyrrolidine derivs. as endothelin antagonists)

178608-57-6 HCAPLUS RN

3-Pyrrolidinecarboxylic acid, 4-(1,3-benzodioxol-5-yl)-1-[2-(dibutylamino)-CN 2-oxoethyl]-2-phenyl-, (2R, 3R, 4S)-rel- (9CI) (CA INDEX NAME)

Relative stereochemistry.

ANSWER 6 OF 6 HCAPLUS COPYRIGHT 2004 ACS on STN

ACCESSION NUMBER: 1996:428406 HCAPLUS

DOCUMENT NUMBER: 125:86623

Preparation of pyrrolidinecarboxylic acid derivatives TITLE:

and analogs as endothelin antagonists

Winn, Martin; Boyd, Steven A.; Hutchins, Charles W.; INVENTOR(S):

Jae, Hwan-Soo; Tasker, Andrew S.; Vongeldern, Thomas

W.; Kester, Jeffrey A.; Sorensen, Bryan K.

Abbott Laboratories, USA PATENT ASSIGNEE(S):

PCT Int. Appl., 277 pp. SOURCE:

CODEN: PIXXD2

Patent DOCUMENT TYPE:

English LANGUAGE:

FAMILY ACC. NUM. COUNT: PATENT INFORMATION:

> APPLICATION NO. DATE KIND DATE PATENT NO. _____ WO 9606095 19960229 WO 1995-US9924 19950804 A1 W: AU, CA, JP, KR, MX RW: AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE

US	5767	144			А	19	980616	US	1995-442575		19950530
AU	9532	137			A1	19	960314	ΑU	1995-32137		19950804
AU	7118	32			В2	19	991021				
EP	7763	24			A1	19	970604	EP	1995-928323		19950804
EP	7763	24			В1	20	020612				
	R:	AT,	BE,	CH,	DE,	DK, E	S, FR,	GB, GI	R, IE, IT, LI,	LU, N	L, PT, SE
JР	1050	4565	,		Т2		980506		1995-508101		19950804
AT	2190	77			E	20	020615	AT	1995-928323		19950804
NZ	5141	71			А	20	031031	NZ	1997-514171		19970212
HK	1008	328			A1	20	030207	HK	1998-109192		19980715
PRIORIT	Y APP	LN.	INFO	. :				US	1994-293349	A	19940819
								US	1994-334717	A	19941104
								US	1995-442575	A	19950530
								US	1995-497998	A	19950802
								WO	1995-US9924	W	19950804
								NZ	1997-503365	A1	19970212
								_			

OTHER SOURCE(S):

MARPAT 125:86623

GΙ

The title compds. [I; Z = CR18R19, CO; wherein R18, R19 = H, lower alkyl; AB n = 0,1; R = (CH2)mW; wherein m = 0-6; W = (un)protected CO2H, P(O)(OH)2, P(O)(OH)E (wherein E = H, lower alkyl, arylalkyl), cyano, CONHR17 (wherein R17 = lower alkyl), alkylaminocarbonyl, dialkylaminocarbonyl, tetrazolyl, OH, alkoxy, sulfamido, CONHSO2R16 (R16 = lower alkyl, haloalkyl, Ph, dialkylamino), etc.; R1, R2 = H, lower alkyl, alkenyl, alkynyl, alkoxyalkyl, alkoxycarbonylalkyl, hydroxyalkyl, alkoxyalkoxyalkyl, thioalkoxyalkoxyalkyl, cycloalkyl, aminocarbonylalkyl, mono- or dialkylaminocarbonylalkyl, aminocarbonylalkenyl, mono- or dialkylaminocarbonylalkenyl, hydroxyalkenyl, aryl, arylalkoxyalkyl, heterocyclyl, etc.; provided that one of R1 and R2 is other than H; R3 = R4COZ5, R6SO2Z7, R26SOZ27, etc.; wherein Z5 = bond, alkylene, alkenylene, N-(un) substituted NH-alkylene or alkylene-NH-alkylene; Z7 = bond, alkylene, alkenylene, N-(un)substituted NH-alkylene; R4, R6 = (un) substituted NH2, lower alkyl, alkenyl, alkynyl, cycloalkyl, cycloalkylalkyl, aryl, arylalkyl, heterocyclyl, heterocyclylalkyl, alkoxyalkyl; R26 = lower alkyl, haloalkyl, alkenyl, alkynyl, cycloalkyl, cycloalkylalkyl, aryl, arylalkyl, heterocyclyl, heterocyclylalkyl,

alkoxyalkyl, alkoxyhaloalkyl; Z27 = alkylene, alkenylene] or pharmaceutically acceptable salts thereof are prepared These compds. are useful for the treatment of hypertension, congestive heart failure, restenosis following arterial injury, cerebral or myocardial ischemia, or atherosclerosis. Thus, addition reaction of Et (4-methoxybenzoyl)acetate with 5-(2-nitrovinyl)-1,3-benzodioxole in the presence of DBU in toluene at 80° for 75 min gave Et 2-(4-methoxybenzoyl)-4-nitromethyl-3-(1,3benzodioxol-5-yl)butyrate which underwent hydrogenation in the presence of a Raney nickel 2800 catalyst in EtOH at 4 atm H pressure to give Et 2-(4-methoxyphenyl)-4-(1,3-benzodioxol-5-yl)-4,5-dihydro-3H-pyrrole-3carboxylate . Reduction of the latter compound with NaBH3CN in the presence of bromocresol in THF under adding dropwise a mixture of concentrated HCl and EtOH gave a mixture of cis, cis-, trans, trans-, and cis, trans-Et 2-(4-methoxyphenyl)-4-(1,3-benzodioxol-5-yl)pyrrolidine-3-carboxylate which underwent alkylation with N-propylbromoacetamide in the presence of (Me2CH) 2NEt in MeCN at 50° for 1 h followed by selective saponification with NaOH in aqueous EtOH and acidification with HCl to give the title compound (II; Rla = H, R2a = n-Pr). The latter compound and II (Rla = R2a = Bu) at 1 μM in vitro inhibited 96.4 and 99.2%, resp., binding of [125I] endothelin 1 to endothelin A receptor in a membrane preparation from MMQ cell line (prolactin secreting rat pituitary cells).

IT 178608-57-6P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of pyrrolidinecarboxylic acid derivs. and analogs as endothelin antagonists for disease therapy)

RN 178608-57-6 HCAPLUS

3-Pyrrolidinecarboxylic acid, 4-(1,3-benzodioxol-5-yl)-1-[2-(dibutylamino)-2-oxoethyl]-2-phenyl-, (2R,3R,4S)-rel- (9CI) (CA INDEX NAME)

Relative stereochemistry.

=> b home FILE 'HOME' ENTERED AT 11:07:04 ON 01 SEP 2004

=>

CN

Connecting via Winsock to STN

Welcome to STN International! Enter x:x

LOGINID:ssspat01plr

PASSWORD:

* * * * * * RECONNECTED TO STN INTERNATIONAL * * * * * * SESSION RESUMED IN FILE 'HOME' AT 11:19:41 ON 01 SEP 2004 FILE 'HOME' ENTERED AT 11:19:41 ON 01 SEP 2004

=> => b medl

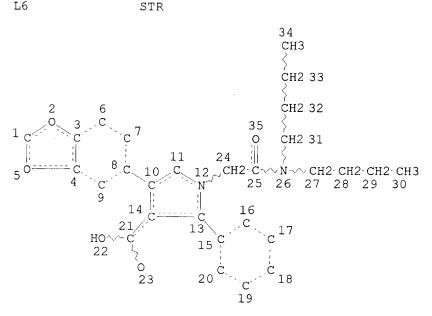
FILE 'MEDLINE' ENTERED AT 11:21:00 ON 01 SEP 2004

FILE LAST UPDATED: 31 AUG 2004 (20040831/UP). FILE COVERS 1951 TO DATE.

On February 29, 2004, the 2004 MeSH terms were loaded. See HELP RLOAD for details. OLDMEDLINE now back to 1951.

MEDLINE thesauri in the /CN, /CT, and /MN fields incorporate the MeSH 2004 vocabulary. See http://www.nlm.nih.gov/mesh/ and http://www.nlm.nih.gov/pubs/techbull/nd03/nd03_mesh.html for a description of changes.

This file contains CAS Registry Numbers for easy and accurate substance identification.



NODE ATTRIBUTES:
CONNECT IS E2 RC AT 1
CONNECT IS E2 RC AT 6

CONNECT IS E2 RC AT 7
CONNECT IS E2 RC AT 9
CONNECT IS E2 RC AT 16
CONNECT IS E2 RC AT 17
CONNECT IS E2 RC AT 18
CONNECT IS E2 RC AT 19
CONNECT IS E2 RC AT 20
CONNECT IS E1 RC AT 23
DEFAULT MLEVEL IS ATOM
DEFAULT ECLEVEL IS LIMITED

GRAPH ATTRIBUTES:
RSPEC 12 15 8
NUMBER OF NODES IS 35

STEREO ATTRIBUTES: NONE

L8 1 SEA FILE=REGISTRY SSS FUL L6

L11 0 SEA FILE=MEDLINE ABB=ON PLU=ON L8

=> b embase

FILE 'EMBASE' ENTERED AT 11:21:11 ON 01 SEP 2004 COPYRIGHT (C) 2004 Elsevier Inc. All rights reserved.

FILE COVERS 1974 TO 26 Aug 2004 (20040826/ED)

EMBASE has been reloaded. Enter HELP RLOAD for details.

This file contains CAS Registry Numbers for easy and accurate substance identification.

=> d que 112 nos

L6 STR

L8 1 SEA FILE=REGISTRY SSS FUL L6

L12 0 SEA FILE=EMBASE ABB=ON PLU=ON L8

=> b biosis

FILE 'BIOSIS' ENTERED AT 11:21:20 ON 01 SEP 2004 Copyright (c) 2004 The Thomson Corporation.

FILE COVERS 1969 TO DATE.

CAS REGISTRY NUMBERS AND CHEMICAL NAMES (CNs) PRESENT FROM JANUARY 1969 TO DATE.

RECORDS LAST ADDED: 26 August 2004 (20040826/ED)

FILE RELOADED: 19 October 2003.

=> d que 113 nos

L6 STR

L8 1 SEA FILE=REGISTRY SSS FUL L6

L13 0 SEA FILE=BIOSIS ABB=ON PLU=ON L8

=> b cancerlit

FILE 'CANCERLIT' ENTERED AT 11:21:32 ON 01 SEP 2004

FILE COVERS 1963 TO 15 Nov 2002 (20021115/ED)

On July 28, 2002, CANCERLIT was reloaded. See HELP RLOAD for details.

CANCERLIT thesauri in the /CN, /CT, and /MN fields incorporate the MeSH 2002 vocabulary. Enter HELP THESAURUS for details.

This file contains CAS Registry Numbers for easy and accurate substance identification.

=> d que 114 L6 STR

NODE ATTRIBUTES:

CONNECT IS E2 RC AT 1 CONNECT IS E2 RC AT 6 CONNECT IS E2 RC AT 7 CONNECT IS E2 RC AT 9 CONNECT IS E2 RC AT 16 CONNECT IS E2 RC AT 17 CONNECT IS E2 RC AT 18 CONNECT IS E2 RC AT 19 CONNECT IS E2 RC AT 20 CONNECT IS E1 RC AT DEFAULT MLEVEL IS ATOM DEFAULT ECLEVEL IS LIMITED

GRAPH ATTRIBUTES:

RSPEC 12 15 8

NUMBER OF NODES IS 35

STEREO ATTRIBUTES: NONE

L8 1 SEA FILE=REGISTRY SSS FUL L6

L14 0 SEA FILE=CANCERLIT ABB=ON PLU=ON L8

=> b home

FILE 'HOME' ENTERED AT 11:21:38 ON 01 SEP 2004

=>

=> b med1

FILE 'MEDLINE' ENTERED AT 10:48:34 ON 01 SEP 2004

FILE LAST UPDATED: 31 AUG 2004 (20040831/UP). FILE COVERS 1951 TO DATE.

On February 29, 2004, the 2004 MeSH terms were loaded. See HELP RLOAD for details. OLDMEDLINE now back to 1951.

MEDLINE thesauri in the /CN, /CT, and /MN fields incorporate the MeSH 2004 vocabulary. See http://www.nlm.nih.gov/mesh/ and http://www.nlm.nih.gov/pubs/techbull/nd03/nd03_mesh.html for a description of changes.

This file contains CAS Registry Numbers for easy and accurate substance identification.

L99 L107	42603 SE 6745 SE 424 SE 241 SE	A FILE=MEDLINE ABB=C	ON PLU=ON ON PLU=ON ON PLU=ON	"PROSTATIC NEOPLASMS"/CT L98(L)DT BICALUTAMIDE L107 AND L99 L112 AND PY<=2000
L98 L99 L109	1) SE 42603 SE 6745 SE 201 SE 116 SE	A FILE=REGISTRY ABB= A FILE=MEDLINE ABB=O A FILE=MEDLINE ABB=O A FILE=MEDLINE ABB=O A FILE=MEDLINE ABB=O A FILE=MEDLINE ABB=O	N PLU=ON N PLU=ON N PLU=ON N PLU=ON	NILUTAMIDE/CN "PROSTATIC NEOPLASMS"/CT L98(L)DT NILUTAMIDE OR L65 L109 AND L99 L114 AND PY<=2000
リ フフ	1) SE. 42603 SE. 6745 SE. 33098 SE. 87 SE.	A FILE=REGISTRY ABB= A FILE=MEDLINE ABB=O A FILE=MEDLINE ABB=O A FILE=MEDLINE ABB=O A FILE=MEDLINE ABB=O A FILE=MEDLINE ABB=O	N PLU=ON N PLU=ON	PREDNISONE/CN "PROSTATIC NEOPLASMS"/CT L98(L)DT L67 OR PREDNISONE L115 AND L99 L116 AND PY<=2000
L99 L118 L119	42603 SEA 6745 SEA 3687 SEA 24 SEA	A FILE=MEDLINE ABB=O A FILE=MEDLINE ABB=O A FILE=MEDLINE ABB=O A FILE=MEDLINE ABB=O	N PLU=ON N PLU=ON N PLU=ON	"PROSTATIC NEOPLASMS"/CT L98(L)DT HYDROCORTISONE/CT(L)TU L99 AND L118 L119 AND PY<=2000
L99	42603 SEA 6745 SEA 1837 SEA 58 SEA	A FILE=MEDLINE ABB=0:	N PLU=ON N PLU=ON N PLU=ON	"PROSTATIC NEOPLASMS"/CT L98(L)DT KETOCONAZOLE/CT(L)TU L99 AND L120 L121 AND PY<=2000
=> d que L98		A FILE=MEDLINE ABB=0	N PLU=ON	"PROSTATIC NEOPLASMS"/CT

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6745 SEA FILE=MEDLINE ABB=ON PLU=ON L98(L)DT
L99
              57 SEA FILE=MEDLINE ABB=ON PLU=ON ("CYPROTERONE ACETATE"/CT(L)TU
L123
                 ) AND L99
              45 SEA FILE=MEDLINE ABB=ON PLU=ON L123 AND PY<=2000
L142
=> d que 1143
          42603 SEA FILE=MEDLINE ABB=ON PLU=ON "PROSTATIC NEOPLASMS"/CT
L98
          6745 SEA FILE=MEDLINE ABB=ON PLU=ON L98(L)DT
L99
           348 SEA FILE=MEDLINE ABB=ON PLU=ON (FLUTAMIDE/CT(L)TU) AND L99
L124
            293 SEA FILE=MEDLINE ABB=ON PLU=ON L124 AND PY<=2000
T-143
=> d que 1144
          42603 SEA FILE=MEDLINE ABB=ON PLU=ON "PROSTATIC NEOPLASMS"/CT
L98
          6745 SEA FILE=MEDLINE ABB=ON PLU=ON L98(L)DT
L99
           25596 SEA FILE=MEDLINE ABB=ON PLU=ON "VITAMIN D"+NT/CT
L125
             44 SEA FILE=MEDLINE ABB=ON PLU=ON (L125(L)TU) AND L99
L126
             17 SEA FILE=MEDLINE ABB=ON PLU=ON L126 AND PY<=2000
L144
=> d que 1145
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L98
          6745 SEA FILE=MEDLINE ABB=ON PLU=ON L98(L)DT
L99
          48031 SEA FILE=MEDLINE ABB=ON PLU=ON ESTROGENS+NT/CT
L127
          1028 SEA FILE=MEDLINE ABB=ON PLU=ON (L127(L)TU) AND L99
L128
            985 SEA FILE=MEDLINE ABB=ON PLU=ON L128 AND PY<=2000
L145
=> d que 1146
          42603 SEA FILE=MEDLINE ABB=ON PLU=ON "PROSTATIC NEOPLASMS"/CT
L98
          6745 SEA FILE=MEDLINE ABB=ON PLU=ON L98(L)DT
155 SEA FILE=MEDLINE ABB=ON PLU=ON (GOSERELIN/CT(L)TU) AND L99
97 SEA FILE=MEDLINE ABB=ON PLU=ON L129 AND PY<=2000
L99
L129
L146
=> d que 1147
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11 SEA FILE=MEDLINE ABB=ON PLU=ON (PROGESTERONE/CT(L)TU) A
L98
L99
                                                    (PROGESTERONE/CT(L)TU) AND
L131
                 T.99
             11 SEA FILE=MEDLINE ABB=ON PLU=ON L131 AND PY<=2000
L147
=> d que 1148
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L98
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L99
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L148
                        bicalutamide
=> d all 1137 3 5 6
                          MEDLINE on STN
L137 ANSWER 3 OF 131
     2001068333
                  MEDLINE
ΑN
     PubMed ID: 11025427
DN
     Antagonist/agonist balance of the nonsteroidal antiandrogen
TТ
     bicalutamide (Casodex) in a new prostate cancer model.
AU
     Hobisch A; Hoffmann J; Lambrinidis L; Eder I E; Bartsch G; Klocker H;
     Culiq Z
```

```
Cook 09/923,616 Text
CS
     Department of Urology, University of Innsbruck, Austria...
     alfred.hobisch@uibk.ac.at
SO
     Urologia internationalis, (2000) 65 (2) 73-9.
     Journal code: 0417373. ISSN: 0042-1138.
CY
     Switzerland
ΤП
     Journal; Article; (JOURNAL ARTICLE)
LΑ
     English
FS
     Priority Journals
EM
     200012
ED
     Entered STN: 20010322
     Last Updated on STN: 20010322
     Entered Medline: 20001227
AΒ
     Androgen ablation is standard therapy for advanced prostate carcinoma. It
     can be administered either as a monotherapy or as a combined androgen
     blockade. In the present study we have investigated molecular mechanisms
     which are responsible for the development of resistance to therapy in
     advanced prostate cancer. For this purpose, we have cultured LNCaP cells
     in steroid-depleted medium for 1 year. The newly generated subline LNCaP-abl was characterized. In early passages (<75) LNCaP-abl cells
     showed a biphasic hypersensitive response to androgenic stimulation.
     Passages later than 75 are inhibited by androgen. Proliferation of
     LNCaP-abl cells was stimulated by the pure nonsteroidal antiandrogen
    bicalutamide (Casodex). To improve our understanding of changes
     which occur during intermittent androgen ablation, we have generated the
     sublines LNCaP-R (reversal; cultured with fetal calf serum) and LNCaP-RA
     (reversal and androgen; cultured with fetal calf serum and androgen) from
    LNCaP-abl cells. In both cell lines an increase of the basal
     proliferation rate was observed. Androgen receptor expression in
    LNCaP-abl cells was 4-fold higher than that in parental LNCaP cells (4.7
    vs. 1.2 fmol/microg protein). Androgen receptor content in LNCaP-R cells
    was 1.8 fmol/microg protein and in LNCaP-RA cells 1.0 fmol/microg protein.
    The basal androgen receptor activity was 30-fold higher in LNCaP-abl cells
     compared to that in parental LNCaP cells. This basal activity was reduced
     in LNCaP-RA cells. Both androgen and the nonsteroidal androgen receptor
    antagonist hydroxyflutamide induced a 2- to 4-fold higher activation of
     androgen receptor in LNCaP-abl than in LNCaP cells. There was a switch
    from an antagonist to an agonist of the nonsteroidal antiandrogen
    bicalutamide (Casodex) in LNCaP-abl cells. Antagonistic
    properties of this androgen receptor blocker were again observed in both
    sublines (LNCaP-R and LNCaP-RA) derived from LNCaP-abl cells. In
     concordance with proliferation data in vitro, growth of LNCaP-abl cells in
    nude mice was stimulated by bicalutamide. In contrast,
     supplementation of androgen led to inhibition of proliferation of these
    cells. The present study provides new information that is useful for a
    better understanding of therapy-refractory prostate cancer. It is also
    important for the development of new therapy strategies for advanced
    carcinoma of the prostate.
    Copyright 2000 S. Karger AG, Basel
CT
    Check Tags: Human; Male; Support, Non-U.S. Gov't
     *Androgen Antagonists: TU, therapeutic use
     *Androgens: AG, agonists
     *Anilides: TU, therapeutic use
       *Prostatic Neoplasms: DT, drug therapy
     Tumor Cells, Cultured
```

L137 ANSWER 5 OF 131 MEDLINE on STN AN 2001031593 MEDLINE

0 (Androgen Antagonists); 0 (Androgens); 0 (Anilides)

90357-06-5 (bicalutamide)

DN PubMed ID: 11025708

RN

CN

- Bicalutamide monotherapy compared with castration in patients with nonmetastatic locally advanced prostate cancer: 6.3 years of followup.

 AU Iversen P; Tyrrell C J; Kaisary A V; Anderson J B; Van Poppel H; Tammela T
- L; Chamberlain M; Carroll K; Melezinek I
- CS Rigshospitalet, University of Copenhagen, Copenhagen, Denmark.
- SO Journal of urology, (2000 Nov) 164 (5) 1579-82. Journal code: 0376374. ISSN: 0022-5347.
- CY United States
- DT Journal; Article; (JOURNAL ARTICLE)
- LA English
- FS Abridged Index Medicus Journals; Priority Journals
- EM 200011
- ED Entered STN: 20010322 Last Updated on STN: 20010322 Entered Medline: 20001121
- PURPOSE: Nonsteroidal antiandrogen monotherapy may be a treatment option AΒ for some patients with advanced prostate cancer. We report a survival and safety update from an analysis of 2 studies in which patients with nonmetastatic (M0) locally advanced disease were treated with either 150 mg. bicalutamide monotherapy or castration. MATERIALS AND METHODS: Data from 2 open label, multicenter studies of identical design were pooled according to protocol. Patients with stage T3/4 prostate cancer were randomized to receive 150 mg. bicalutamide daily or castration (orchiectomy or 3.6 mg. goserelin acetate every 28 days) in a 2:1 ratio. RESULTS: A total of 480 patients with locally advanced prostate cancer were randomized to treatment. After a median followup of 6.3 years mortality was 56%. There was no statistically significant difference between the 2 groups in overall survival (hazard ratio 1.05, upper 1-sided 95% confidence limit 1.31, p = 0.70) or time to progression (1.20, 1.45, p = 0.11). There were statistically significant benefits in the bicalutamide monotherapy group in the 2 quality of life parameters of sexual interest (p = 0.029) and physical capacity (p = 0.029)0.046). The highest incidences of adverse events were the pharmacological side effects of hot flashes in the castration group, and breast pain and gynecomastia in the bicalutamide group. The incidences of other types of adverse events were low. Bicalutamide was well tolerated, with few drug related withdrawals from study, and no new safety issues were identified during this longer followup. CONCLUSIONS: Monotherapy with 150 mg. bicalutamide is an attractive alternative to castration in patients with locally advanced prostate cancer for whom immediate hormone therapy is indicated.
- CT Check Tags: Comparative Study; Human; Male; Support, Non-U.S. Gov't
- *Androgen Antagonists: TU, therapeutic use
 - *Anilides: TU, therapeutic use
 - *Castration

Disease Progression Follow-Up Studies

Multicenter Studies

*Prostatic Neoplasms: DT, drug therapy

Prostatic Neoplasms: MO, mortality *Prostatic Neoplasms: SU, surgery Randomized Controlled Trials

Survival Analysis

RN 90357-06-5 (bicalutamide)

CN 0 (Androgen Antagonists); 0 (Anilides)

L137 ANSWER 6 OF 131 MEDLINE on STN

AN 2001008175 MEDLINE

DN PubMed ID: 10853458

```
New indication sought for bicalutamide.
TI
ΑU
     Anonymous
     Oncology (Williston Park, N.Y.), (2000 May) 14 (5) 654, 772.
SO
     Journal code: 8712059. ISSN: 0890-9091.
     United States
CY
     News Announcement
DT
LA
     English
FS
     Priority Journals
EM
     200010
ED
     Entered STN: 20010322
     Last Updated on STN: 20010322
     Entered Medline: 20001025
CT
     Check Tags: Human; Male
      Androgen Antagonists: AE, adverse effects
      Androgen Antagonists: PD, pharmacology
     *Androgen Antagonists: TU, therapeutic use
      Anilides: AE, adverse effects
      Anilides: PD, pharmacology
     *Anilides: TU, therapeutic use
      Antineoplastic Agents, Hormonal: AE, adverse effects
      Antineoplastic Agents, Hormonal: PD, pharmacology
     *Antineoplastic Agents, Hormonal: TU, therapeutic use
      Antineoplastic Combined Chemotherapy Protocols: TU, therapeutic use
      Castration
      Chemotherapy, Adjuvant
      Neoadjuvant Therapy
       *Prostatic Neoplasms: DT, drug therapy
      Quality of Life
      Randomized Controlled Trials
RN
     90357-06-5 (bicalutamide)
CN
     0 (Androgen Antagonists); 0 (Anilides); 0 (Antineoplastic Agents,
     Hormonal); 0 (Antineoplastic Combined Chemotherapy Protocols)
=> d all 1138 1 2 3
                        MEDLINE on STN
L138 ANSWER 1 OF 99
AN
     2000512716 MEDLINE
DN
     PubMed ID: 11071217
TΙ
     Androgen blockade in prostate cancer.
CM
     Comment on: Lancet. 2000 Apr 29;355(9214):1491-8. PubMed ID: 10801170
ΑIJ
     Labrie F; Candas B
     Lancet, (2000 Jul 22) 356 (9226) 341-2.
SO
     Journal code: 2985213R. ISSN: 0140-6736.
CY
     ENGLAND: United Kingdom
DT
     Commentary
     Letter
TιΔ
     English
FS
     Abridged Index Medicus Journals; Priority Journals
EΜ
     200011
     Entered STN: 20010322
ED
     Last Updated on STN: 20011004
     Entered Medline: 20001128
CT
     Check Tags: Human; Male
     *Androgen Antagonists: TU, therapeutic use
      Cyproterone Acetate: TU, therapeutic use
     *Flutamide: TU, therapeutic use
     *Imidazoles: TU, therapeutic use
     Meta-Analysis
      Orchiectomy
```

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*Prostatic Neoplasms: DT, drug therapy
RN 13311-84-7 (Flutamide); 427-51-0 (Cyproterone Acetate); 63612-50-0 (nilutamide)
CN 0 (Androgen Antagonists); 0 (Imidazoles)
L138 ANSWER 2 OF 99 MEDLINE on STN
AN 2000259108 MEDLINE
DN PubMed ID: 10801170
TI Maximum androgen blockade in advanced prostate cancer: an overview of the
```

- randomised trials. Prostate Cancer Trialists' Collaborative Group.

 CM Comment in: ACP J Club. 2001 Jan-Feb; 134(1):23

 Comment in: Lancet 2000 Apr 29:355(9214):1474-5 PubMed ID: 10801162
- Comment in: Lancet. 2000 Apr 29;355(9214):1474-5. PubMed ID: 10801162 Comment in: Lancet. 2000 Jul 22;356(9226):341-2. PubMed ID: 11071217
- AU Anonymous
- SO Lancet, (2000 Apr 29) 355 (9214) 1491-8. Journal code: 2985213R. ISSN: 0140-6736.
- CY ENGLAND: United Kingdom
- DT Journal; Article; (JOURNAL ARTICLE) (META-ANALYSIS)
- LA English
- FS Abridged Index Medicus Journals; Priority Journals
- EM 200005
- ED Entered STN: 20000606 Last Updated on STN: 20011004 Entered Medline: 20000522
- BACKGROUND: In advanced prostate cancer, androgen suppression (AS) by AΒ surgery or drugs controls testicular hormone secretion, and the further addition of an antiandrogen such as nilutamide, flutamide, or cyproterone acetate is referred to as maximum androgen blockade (MAB). The aim of this overview was to compare the effects on the duration of survival of MAB and of AS alone. METHODS: The collaborative meta-analysis of 27 randomised trials involved central reanalysis of the data on each of 8275 men (98% of those ever randomised in trials of MAB vs AS) with metastatic (88%) or locally advanced (12%) prostate cancer. Half were over 70 years of age, and follow-up was typically for about 5 years. FINDINGS: 5932 (72%) men have died; of the deaths for which causes were provided, about 80% were attributed to prostate cancer. 5-year survival was 25.4% with MAB versus 23.6% with AS alone, a non-significant gain of 1.8% (SE 1.3; logrank 2p=0.11). There was no significant heterogeneity in the treatment effect (MAB vs AS) with respect to age or disease stage. The results for cyproterone acetate, which accounted for only a fifth of the evidence, appeared slightly unfavourable to MAB (5-year survival 15.4% MAB vs 18.1% AS alone; difference -2.8% [SE 2.4]; logrank 2p=0.04 adverse), whereas those for nilutamide and flutamide appeared slightly favourable (5-year survival 27.6% MAB vs 24.7% AS alone; difference 2.9% [SE 1.3]; logrank 2p=0.005). Non-prostate-cancer deaths (although not clearly significantly affected by treatment) accounted for some of the apparently adverse effects of cyproterone acetate. INTERPRETATION: In advanced prostate cancer, addition of an antiandrogen to AS improved the 5-year survival by about 2% or 3% (depending on whether the analysis includes or excludes the cyproterone acetate trials), but the range of uncertainty as to the true size of this benefit runs from about 0% to about 5%.
- CT Check Tags: Human; Male; Support, Non-U.S. Gov't Aged
 - *Androgen Antagonists: TU, therapeutic use
 - *Cyproterone: TU, therapeutic use
 - *Flutamide: TU, therapeutic use
 - *Imidazoles: TU, therapeutic use Orchiectomy

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*Prostatic Neoplasms: DT, drug therapy
      Prostatic Neoplasms: MO, mortality
      Prostatic Neoplasms: SU, surgery
      Randomized Controlled Trials
      Survival Analysis
     13311-84-7 (Flutamide); 2098-66-0 (Cyproterone); 63612-50-0
     (nilutamide)
CN
     0 (Androgen Antagonists); 0 (Imidazoles)
L138 ANSWER 3 OF 99
                        MEDLINE on STN
     2000138748
AN
                    MEDLINE
     PubMed ID: 10673793
DN
TT
     Antiandrogens: a summary review of pharmacodynamic properties and
     tolerability in prostate cancer therapy.
ΑU
     Migliari R; Muscas G; Murru M; Verdacchi T; De Benedetto G; De Angelis M
CS
     Operative Unit of Urology, ASL 8, Arezzo, Italy.. uromig@tin.it
SO
     Archivio italiano di urologia, andrologia : organo ufficiale [di] Societa
     italiana di ecografia urologica e nefrologica / Associazione ricerche in
     urologia, (1999 Dec) 71 (5) 293-302. Ref: 65
     Journal code: 9308247. ISSN: 1124-3562.
CY
     Italy
DT
     Journal; Article; (JOURNAL ARTICLE)
     General Review; (REVIEW)
     (REVIEW, TUTORIAL)
LΑ
     English
FS
     Priority Journals
EM
     200002
ED
     Entered STN: 20000314
     Last Updated on STN: 20000314
     Entered Medline: 20000229
AB
     This article provides a summary of the pharmacodynamic properties of major
     antiandrogens as well as an extensive review of their tolerability.
     Presently there are two classes of androgen receptor antagonists: the
     so-called pure, non-steroidal antiandrogens which include flutamide,
     nilutamide and the more recent bicalutamide and the steroidal
     antiandrogens cyproterone acetate, megestrol acetate and WIN 49596.
     Although non steroidal and steroidal compounds have been found to be
     equally effective in the treatment of prostate cancer presently no studies
     comparing the use of steroidal or non steroidal antiandrogens with
     chemical or surgical castration have evaluated quality of life per se.
     The only advantage of cyproterone acetate on pure antiandrogens seems to
     be the low incidence of hot flushes; a commonly reported adverse effect of
     androgen ablative therapy. However, hepatotoxicity associated with long
     term daily doses of 300 mg daily and the unacceptably high incidence of
     cardiovascular side effects (10%) should restrict its use to patients who
     are intolerant of pure antiandrogen compound. In contrast to steroidal
     compound nonsteroidal compounds let sexual potency to be retained, which
     is an important consideration with respect to the quality of life of some
     patients and, at present, the main indication for monotherapy with the
    pure antiandrogens. As regard as pure antiandrogens clinically important
     adverse events including gastrointestinal events, particularly diarrhea
     and occasional disturbances of liver function related to flutamide
     treatment and antabuse effect, problems with light-dark adaptation and
     rare interstitial pneumonitis related to nilutamide indicates
     the bicalutamide, due to its better tolerability profile, together with
     its once-daily oral administration regimen, could be considered the
    antiandrogen of first choice in the treatment of prostatic cancer.
CT
    Check Tags: Human; Male
     *Androgen Antagonists: PD, pharmacology
     *Androgen Antagonists: TU, therapeutic use
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Anilides: PD, pharmacology
      Anilides: TU, therapeutic use
      Antineoplastic Agents, Hormonal: PD, pharmacology
      Antineoplastic Agents, Hormonal: TU, therapeutic use
      Flutamide: PD, pharmacology
      Flutamide: TU, therapeutic use
      Imidazoles: PD, pharmacology
      Imidazoles: TU, therapeutic use
       *Prostatic Neoplasms: DT, drug therapy
      Receptors, Androgen: AI, antagonists & inhibitors
     13311-84-7 (Flutamide); 63612-50-0 (nilutamide); 90357-06-5
RN
     (bicalutamide)
CN
     0 (Androgen Antagonists); 0 (Anilides); 0 (Antineoplastic Agents,
     Hormonal); 0 (Imidazoles); 0 (Receptors, Androgen)
=> d all 1139 2 3 5
L139 ANSWER 2 OF 61
                        MEDLINE on STN
AN
     2001192615
                   MEDLINE
DN
     PubMed ID: 11205458
TI
    Chemotherapy in advanced androgen-independent prostate cancer 1990-1999: a
     decade of progress?.
AU
    Culine S; Droz J P
    Department of Medicine, CRLC Val d'Aurelle, Montpellier, France..
CS
    stculine@valdorel.fnclcc.fr
    Annals of oncology: official journal of the European Society for Medical
SO
    Oncology / ESMO, (2000 Dec) 11 (12) 1523-30. Ref: 74
    Journal code: 9007735. ISSN: 0923-7534.
CY
    Netherlands
DT
    Journal; Article; (JOURNAL ARTICLE)
    General Review; (REVIEW)
     (REVIEW, TUTORIAL)
    English
LΑ
FS
    Priority Journals
EΜ
    200104
ED
    Entered STN: 20010410
    Last Updated on STN: 20010410
    Entered Medline: 20010405
    BACKGROUND AND PURPOSE: A great number of clinical research studies have
AB
    been reported in the field of chemotherapy for advanced
    androgen-independent prostate cancer during the last ten years. The aims
    of the present review were to assess their impact on management of the
    disease and on survival of patients. METHODS: The review of full
    published reports was facilited by the use of a MEDLINE computer search.
    RESULTS: Clinical research studies have focused on defining guidelines for
    eligibility criteria and accurate endpoints for patients to be enrolled
    onto clinical trials and developing new agents or combination of drugs
    including estramustine phosphate. Any combination of current chemotherapy
    has no impact on overall survival of patients. Among drugs in
    development, only the promising activity observed with docetaxel deserves
    randomized trials to assess its impact on survival. The major innovative
    advance of the 90s is the demonstration of the impact of chemotherapy
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Searched by P. Ruppel

quality of life along with a concomitant decrease in costs was observed. CONCLUSIONS: At the present time, chemotherapy should be considered as a palliative treatment in patients with symptomatic androgen-independent disease. The enrollment of patients into clinical trials dealing with quality of life as primary endpoint is strongly solicited. A standard

(mitoxantrone + prednisone) on quality of life as compared to prednisone alone. A greater and longer-lasting improvement in

methodology should be used in phase II trials with a primary goal of selection of agents which should progress to randomized trials using survival as an endpoint. Hopefully new specific strategies targeted to reverse the molecular changes that underlie prostate tumorigenesis should rapidly impact the multimodality management of AIPC in the third millenium.

millenium.

CT Check Tags: Human; Male
 Antineoplastic Agents, Hormonal: TU, therapeutic use
 Antineoplastic Combined Chemotherapy Protocols: TU, therapeutic use
 *Antineoplastic Combined Chemotherapy Protocols: TU, therapeutic use
 Mitoxantrone: TU, therapeutic use
 Neoplasm Metastasis

*Paclitaxel: AA, analogs & derivatives
 Paclitaxel: TU, therapeutic use
 Palliative Care
 Prednisolone: TU, therapeutic use
 *Prostatic Neoplasms: DT, drug therapy
 Prostatic Neoplasms: PA, pathology

*Quality of Life

Randomized Controlled Trials

*Taxoids

RN 114977-28-5 (docetaxel); 33069-62-4 (Paclitaxel); 50-24-8 (Prednisolone); 65271-80-9 (Mitoxantrone)

- L139 ANSWER 3 OF 61 MEDLINE on STN
- AN 2000217012 MEDLINE
- DN PubMed ID: 10751862
- TI Prostate specific antigen response to mitoxantrone and **prednisone** in patients with refractory prostate cancer: prognostic factors and generalizability of a multicenter trial to clinical practice.
- AU Dowling A J; Czaykowski P M; Krahn M D; Moore M J; Tannock I F
- CS Department of Medical Oncology and Hematology, Princess Margaret Hospital, University of Toronto, Toronto, British Columbia.
- SO Journal of urology, (2000 May) 163 (5) 1481-5. Journal code: 0376374. ISSN: 0022-5347.
- CY United States
- DT Journal; Article; (JOURNAL ARTICLE)
- LA English
- FS Abridged Index Medicus Journals; Priority Journals
- EM 200005
- ED Entered STN: 20000512 Last Updated on STN: 20000512 Entered Medline: 20000502
- AB PURPOSE: We determine prostate specific antigen (PSA) response and durability, and prognostic factors associated with response and survival in patients with symptomatic hormone refractory prostate cancer treated with mitoxantrone and prednisone at a single institution. We then compare the results with those of a randomized phase III clinical trial. MATERIALS AND METHODS: A retrospective review of all 133 patients treated with mitoxantrone and prednisone at Princess Margaret Hospital since 1994 was performed. PSA response and duration, and overall survival were determined as well as the influence of baseline factors on these outcome parameters. Results were compared to those for patients randomized to receive mitoxantrone and prednisone in the Canadian clinical trial which demonstrated palliative benefit of this regimen. RESULTS: Patients treated after trial closure had shorter survival (p = 0.003) but represented a poorer prognosis cohort. PSA

response of the trial and post-trial cases was 34% and 28%, respectively (p = 0.36), and median duration of response was 118 and 175 days or greater, respectively. Factors predictive of PSA response in the non-trial cohort were longer time from diagnosis of prostate cancer (p = 0. 027) and higher baseline PSA (p = 0.013). Factors predictive of increased survival in both groups were younger age (p <0.04), better baseline Eastern Cooperative Oncology Group performance status (p <0. 02), and higher hemoglobin (p </=0.05) and PSA response (p <0.0001). Gleason score was not predictive of response or survival. CONCLUSIONS: Although patients treated outside of the trial had poorer prognostic features, rates of PSA response to mitoxantrone and prednisone were comparable. Factors predictive of survival were similar in the 2 cohorts. Results of the randomized trial are generalizable to clinical practice. Check Tags: Comparative Study; Human; Male; Support, Non-U.S. Gov't *Adenocarcinoma: BL, blood *Adenocarcinoma: DT, drug therapy Adenocarcinoma: MO, mortality *Antineoplastic Combined Chemotherapy Protocols: TU, therapeutic use Clinical Trials, Phase III Middle Aged Mitoxantrone: AD, administration & dosage Multicenter Studies Prednisone: AD, administration & dosage Prognosis *Prostate-Specific Antigen: BL, blood *Prostatic Neoplasms: BL, blood *Prostatic Neoplasms: DT, drug therapy Prostatic Neoplasms: MO, mortality Randomized Controlled Trials Retrospective Studies Survival Rate **53-03-2** (**Prednisone**); 65271-80-9 (Mitoxantrone) 0 (Antineoplastic Combined Chemotherapy Protocols); EC 3.4.21.77 (Prostate-Specific Antigen) L139 ANSWER 5 OF 61 MEDLINE on STN MEDLINE 2000067760 PubMed ID: 10604271 Docetaxel (Taxotere) and estramustine versus mitoxantrone and prednisone for hormone-refractory prostate cancer: scientific basis and design of Southwest Oncology Group Study 9916. Hussain M; Petrylak D; Fisher E; Tangen C; Crawford D Department of Internal Medicine, Wayne State University School of Medicine and Barbara Ann Karmanos Cancer Institute, Detroit, MI, USA. Seminars in oncology, (1999 Oct) 26 (5 Suppl 17) 55-60. Journal code: 0420432. ISSN: 0093-7754. United States Journal; Article; (JOURNAL ARTICLE) English Priority Journals 199912 Entered STN: 20000113 Last Updated on STN: 20000113 Entered Medline: 19991222 Hormone-refractory prostate cancer is the terminal step in the natural history of prostate cancer. To date, no chemotherapeutic agents have been shown to impact clinical outcome at this stage. Recently, the Food and Drug Administration approved the combination of mitoxantrone and prednisone based solely on its superior palliative effects as

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compared to steroids alone in 2 randomized trials. Progress in biologically driven drug development has led to the identification of several estramustine-based regimens that, although based on single institution experience, appear to have at least a comparable but very promising level of activity in hormone-refractory prostate cancer patients. One such combination, estramustine plus docetaxel (Taxotere; Rhone-Poulenc Rorer, Collegeville, PA), is particularly attractive because of its convenient schedule and side effect profile. To objectively assess the therapeutic benefit of this combination, the Southwest Oncology Group is initiating a randomized phase III trial comparing estramustine and docetaxel with the standard arm of mitoxantrone and prednisone using time to progression and survival as the primary end points. Secondary end points will include toxicity profiles, assessments of quality of life parameters, and magnitude of decline of prostate-specific antigen levels between the two treatment arms. Check Tags: Comparative Study; Human; Male *Adenocarcinoma: DT, drug therapy Adenocarcinoma: SC, secondary *Antineoplastic Combined Chemotherapy Protocols: TU, therapeutic use Clinical Trials, Phase III Estramustine: AD, administration & dosage Mitoxantrone: AD, administration & dosage *Neoplasms, Hormone-Dependent: DT, drug therapy Neoplasms, Hormone-Dependent: PA, pathology Paclitaxel: AD, administration & dosage *Paclitaxel: AA, analogs & derivatives Prednisone: AD, administration & dosage *Prostatic Neoplasms: DT, drug therapy Prostatic Neoplasms: PA, pathology Randomized Controlled Trials *Taxoids 114977-28-5 (docetaxel); 2998-57-4 (Estramustine); 33069-62-4 (Paclitaxel); 53-03-2 (Prednisone); 65271-80-9 (Mitoxantrone) 0 (Antineoplastic Combined Chemotherapy Protocols); 0 (Taxoids) => d all 1140 1-3 L140 ANSWER 1 OF 22 MEDLINE on STN 2001154998 MEDLINE PubMed ID: 11204256 Suramin administration is associated with a decrease in serum calcium levels. Walther M M; Rehak N N; Venzon D; Myers C E; Linehan W M; Fiqq W D Urologic Oncology Branch, DCS/NCI/NIH, Bethesda, MD 20892-1501, USA.. macw@nih.gov World journal of urology, (2000 Dec) 18 (6) 388-91. Journal code: 8307716. ISSN: 0724-4983. Germany: Germany, Federal Republic of Journal; Article; (JOURNAL ARTICLE) English Priority Journals 200103 Entered STN: 20010404 Last Updated on STN: 20010404 Entered Medline: 20010322 Suramin has been shown to have an effect on bone resorption in in vitro models. It is not clear if a similar effect is seen in patients treated

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with suramin. The clinical effect of suramin treatment on total serum calcium was examined in two groups of patients with hormone-refractory

prostate cancer. In all, 28 patients in group 1 were examined within 2 weeks before and 2 weeks after suramin treatment and 72 patients in group 2 were examined within 2 weeks before, during, and after treatment with suramin. In addition, calcium controls spiked with suramin were run in three different commercially available assays for evaluation of the effect of suramin dose on calcium determination. Group 1 patients showed a decrease in serum calcium after treatment with suramin. The mean uncorrected serum calcium level was 2.29 +/- 0.025 mmol/l before treatment and 2.09 \pm 0.025 mmol/l after treatment (P < 0.0001, paired Wilcoxon test). The mean serum calcium value corrected for albumin was 2.33 +/-0.02 mmol/l before treatment and 2.24 +/- 0.02 mmol/l after treatment (P = $\frac{1}{2}$ 0.0022, paired Wilcoxon test). Group 2 patients also displayed a decrease in serum calcium after treatment with suramin. The mean baseline value was 2.23 mmol/l (median 2.26 mmol/l, range 1.20-2.54 mmol/l). The mean level of serum calcium corrected for albumin as determined at the end of treatment was 2.14 mmol/l (median 2.16 mmol/l, range 0.98 2.46 mmol/l). In all, 48 patients for whom pre- and post-treatment values were available for analysis displayed a median calcium decrease of 0.09 mmol/l ($P = \frac{1}{2}$ 0.0005, Wilcoxon signed-rank test for the null hypothesis of no change). For 68 patients in group 2, data on serial serum calcium measurements during treatment were available for analysis. A projected median decrease in serum calcium of 0.06 mmol/l (range 0.43 to 0.72 mmol/l) over an 8-week interval of suramin therapy was found. Overall, 47 of the 68 slopes were negative (P = 0.0022, Wilcoxon signed-rank test). Nine patients were treated with suramin for less than 6 weeks. These patients' calcium levels were significantly higher than those of 50 patients treated for longer periods (median value 2.24 versus 2.16 mmol/l, P = 0.035, Wilcoxon rank-sum test). No correlation was found between suramin dose and calcium level using the Kodak Ektachem, Hitachi 914, or Synchron Clinical System CX3 method. In conclusion, suramin treatment was consistently associated with decreases in serum calcium in two groups of patients with hormone-refractory cancer. Suramin placed in calcium controls did not affect calcium determination using three commercially available methods. Check Tags: Human; Male Anti-Inflammatory Agents: TU, therapeutic use Antineoplastic Agents: AD, administration & dosage *Antineoplastic Agents: TU, therapeutic use Antineoplastic Agents, Hormonal: TU, therapeutic use Antineoplastic Combined Chemotherapy Protocols *Calcium: BL, blood Drug Administration Schedule Drug Resistance Hormones: TU, therapeutic use Hydrocortisone: TU, therapeutic use Leuprolide: TU, therapeutic use Pilot Projects *Prostatic Neoplasms: BL, blood *Prostatic Neoplasms: DT, drug therapy Retreatment Retrospective Studies Suramin: AD, administration & dosage *Suramin: TU, therapeutic use

L140 ANSWER 2 OF 22 MEDLINE on STN AN 2000385998 MEDLINE

7440-70-2 (Calcium)

(Hormones)

CT

RN

CN

145-63-1 (Suramin); 50-23-7 (Hydrocortisone); 53714-56-0 (Leuprolide);

0 (Anti-Inflammatory Agents); 0 (Antineoplastic Agents); 0 (Antineoplastic

Agents, Hormonal); 0 (Antineoplastic Combined Chemotherapy Protocols); 0

```
DN
     PubMed ID: 10848697
тT
     Stilboestrol plus adrenal suppression as salvage treatment for patients
     failing treatment with luteinizing hormone-releasing hormone analogues and
     orchidectomy.
ΑU
     Farrugia D; Ansell W; Singh M; Philp T; Chinegwundoh F; Oliver R T
CS
     Urological Oncology, The Royal Hospitals Trust, and Whipps Cross Hospital,
     London, UK.
SO
     BJU international, (2000 Jun) 85 (9) 1069-73.
     Journal code: 100886721. ISSN: 1464-4096.
CY
     ENGLAND: United Kingdom
DT
     Journal; Article; (JOURNAL ARTICLE)
LΑ
     English
FS
     Priority Journals
EM
     200008
     Entered STN: 20000818
     Last Updated on STN: 20000818
     Entered Medline: 20000810
AΒ
     OBJECTIVE: To investigate the efficacy of low-dose stilboestrol (SB) with
     hydrocortisone in patients with advanced prostate cancer refractory to
     androgen suppression. PATIENTS AND METHODS: Thirty-four consecutive
     patients (median age 70 years, range 51-83) with metastatic disease who
     progressed on hormone therapy, as shown by recurrent/worsening symptoms
     and an increase in prostate-specific antigen (PSA) level, were recruited
     and discontinued hormonal treatment before starting SB. Patients received
     SB (1 mg/day) combined with hydrocortisone (40 mg/day). In an attempt to
     reduce the incidence of thrombo-embolic events, aspirin (75 mg/day) was
     also added. RESULTS: Stilboestrol was the second-line treatment in 19
     patients and the third or fourth in 15. The median (range) duration of
     treatment with SB was 5 (0.5-21) months and the median follow-up 7.5
     months, with 18 patients still alive and 14 still on treatment. Of 29
     symptomatic patients, 24 had symptomatic improvement and five had no clear
     benefit; the median duration of benefit was 6 (2-21) months. The PSA
     level decreased by 0-50% in six patients, by 50-90% in 13 and by > 90% in
     eight, while there was symptomatic improvement in these three categories
     in five, 11 and seven patients, respectively. The median times to PSA
     nadir and progression were 4 and 6 months, respectively. Some
     thrombo-embolic events and fluid retention occurred but overall the
     treatment was well tolerated. CONCLUSION: Low-dose SB with hydrocortisone
     is effective in refractory prostate cancer, although there is some
     toxicity. Randomized studies against hydrocortisone or SB alone are
     needed to establish the cost/benefit ratio of this combination.
CT
     Check Tags: Human; Male
     Aged
     Aged, 80 and over
     *Antineoplastic Agents, Hormonal: TU, therapeutic use
     Aspirin: TU, therapeutic use
     *Diethylstilbestrol: TU, therapeutic use
     Drug Therapy, Combination
      Gonadorelin: AA, analogs & derivatives
      Gonadorelin: AI, antagonists & inhibitors
       *Hydrocortisone: TU, therapeutic use
     Middle Aged
     *Orchiectomy: MT, methods
       *Prostatic Neoplasms: DT, drug therapy
     Salvage Therapy: MT, methods
     Treatment Failure
    33515-09-2 (Gonadorelin); 50-23-7 (Hydrocortisone); 50-78-2 (Aspirin);
RN
     56-53-1 (Diethylstilbestrol)
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0 (Antineoplastic Agents, Hormonal)

CN

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Cook 09/923,616 Text
L140 ANSWER 3 OF 22
                        MEDLINE on STN
     2000200496
                    MEDLINE
DN
     PubMed ID: 10735891
     Suramin therapy for patients with symptomatic hormone-refractory prostate
TI
     cancer: results of a randomized phase III trial comparing suramin plus
     hydrocortisone to placebo plus hydrocortisone.
ΑU
     Small E J; Meyer M; Marshall M E; Reyno L M; Meyers F J; Natale R B;
     Lenehan P F; Chen L; Slichenmyer W J; Eisenberger M
CS
     University of California at San Francisco Comprehensive Cancer Center, San
     Francisco 94115, USA.. smalle@medicine.ucsf.du
SO
     Journal of clinical oncology: official journal of the American Society of
     Clinical Oncology, (2000 Apr) 18 (7) 1440-50.
     Journal code: 8309333. ISSN: 0732-183X.
CY
     United States
DT
     (CLINICAL TRIAL)
     (CLINICAL TRIAL, PHASE III)
     Journal; Article; (JOURNAL ARTICLE)
     (RANDOMIZED CONTROLLED TRIAL)
LA
     English
FS
     Priority Journals
EM
     200004
ED
     Entered STN: 20000505
     Last Updated on STN: 20000505
     Entered Medline: 20000421
     PURPOSE: Suramin is a novel agent that has demonstrated preliminary
AΒ
     evidence of antitumor activity in hormone-refractory prostate cancer
     (HRPC). A prospective randomized clinical trial was designed to evaluate
     pain and opioid analgesic intake as surrogates for antitumor response in
     HRPC patients with significant, opioid analgesic-dependent pain. PATIENTS
     AND METHODS: A double-blind, placebo-controlled trial randomized patients
     to receive a 78-day, outpatient regimen of either suramin plus
     hydrocortisone (HC, 40 mg/d) or placebo plus HC. Treatment assignment was
     unblinded when either disease progression or dose-limiting toxicity
     occurred; placebo patients were allowed to cross-over to open-label
     suramin plus HC. In addition to pain and opioid analgesic intake,
    prostate-specific antigen (PSA) response, time to disease progression,
    quality of life, performance status, and survival were compared. RESULTS:
    Overall mean reductions in combined pain and opioid analgesic intake were
    greater for suramin plus HC (rank sum P = .0001). Pain response was
    achieved in a higher proportion of patients receiving suramin than placebo
     (43% v 28%; P = .001), and duration of response was longer for suramin
    responders (median, 240 v 69 days; P = .0027). Time to disease progression
    was longer (relative risk = 1.5; 95% confidence interval, 1.2 to 1.9) and
    the proportion of patients with a greater than 50% decline in PSA was
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CT Check Tags: Human; Male; Support, Non-U.S. Gov't
Adult
Aged
Aged, 80 and over
Anti-Inflammatory Agents, Non-Steroidal: AD, administration & dosage
*Anti-Inflammatory Agents, Non-Steroidal: TU, therapeutic use
Antineoplastic Agents: AD, administration & dosage

*Antineoplastic Agents: TU, therapeutic use Disease Progression

with symptomatic HRPC.

higher (33% v 16%; P = .01) in patients who received suramin. Neither quality of life nor performance status was decreased by suramin treatment, and overall survival was similar. Most adverse events were of mild or moderate intensity and were easily managed medically. CONCLUSION:

Outpatient treatment with suramin plus HC is well tolerated and provides moderate palliative benefit and delay in disease progression for patients

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Double-Blind Method
      Drug Therapy, Combination
      Hydrocortisone: AD, administration & dosage
       *Hydrocortisone: TU, therapeutic use
      Middle Aged
     *Pain: DT, drug therapy
     *Palliative Care
       *Prostatic Neoplasms: DT, drug therapy
      Prostatic Neoplasms: PA, pathology
      Prostatic Neoplasms: PP, physiopathology
      Quality of Life
      Suramin: AD, administration & dosage
     *Suramin: TU, therapeutic use
      Treatment Outcome
     145-63-1 (Suramin); 50-23-7 (Hydrocortisone)
RN
     0 (Anti-Inflammatory Agents, Non-Steroidal); 0 (Antineoplastic Agents)
CN
=> d all 1141 1 2 4
L141 ANSWER 1 OF 56
                        MEDLINE on STN
AN
     2000468935
                    MEDLINE
DN
     PubMed ID: 11022738
     Inhibitors of the key enzymes of androgen synthesis: potential agents as
ΤI
     targets for prostate cancer.
AIJ
     Takeda M; Hosaka M
     Department of Urology, Yokohama City University School of Medicine.
CS
SO
     Nippon rinsho. Japanese journal of clinical medicine, (2000 Jul)
     58 Suppl 312-6. Ref: 14
     Journal code: 0420546. ISSN: 0047-1852.
CY
     Japan
DΤ
     Journal; Article; (JOURNAL ARTICLE)
     General Review; (REVIEW)
     (REVIEW LITERATURE)
LA
     Japanese
FS
     Priority Journals
EM
     200012
     Entered STN: 20010322
ED
     Last Updated on STN: 20010322
     Entered Medline: 20001212
СТ
     Check Tags: Human; Male
      17-Hydroxysteroid Dehydrogenases: AI, antagonists & inhibitors
     *Androgen Antagonists: TU, therapeutic use
     *Androstenols: TU, therapeutic use
      Animals
     *Antineoplastic Agents, Hormonal: TU, therapeutic use
     *Carbazoles: TU, therapeutic use
      Enzyme Inhibitors: TU, therapeutic use
     *Imidazoles: TU, therapeutic use
       *Ketoconazole: TU, therapeutic use
       *Prostatic Neoplasms: DT, drug therapy
      Steroid 17-alpha-Hydroxylase: AI, antagonists & inhibitors
     *Testosterone: BI, biosynthesis
RN
     115575-11-6 (liarozole); 154229-19-3 (abiraterone); 58-22-0
     (Testosterone); 65277-42-1 (Ketoconazole)
CN
     0 (Androgen Antagonists); 0 (Androstenols); 0 (Antineoplastic Agents.
     Hormonal); 0 (Carbazoles); 0 (Enzyme Inhibitors); 0 (Imidazoles); 0 (YM
     116); EC 1.1.- (17-Hydroxysteroid Dehydrogenases); EC 1.14.99.9 (Steroid
     17-alpha-Hydroxylase)
```

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L141 ANSWER 2 OF 56
                        MEDLINE on STN
AN
     2000434743
                    MEDLINE
DN
     PubMed ID: 10564905
TI
     Treating prostate cancer. Part V: androgen deprivation and chemotherapy.
ΑU
SO
     Harvard men's health watch, (1999 Dec) 4 (5) 5-8. Ref: 0
     Journal code: 9802701. ISSN: 1089-1102.
CY
     United States
DT
     Journal; Article; (JOURNAL ARTICLE)
     General Review; (REVIEW)
     (REVIEW, TUTORIAL)
LΑ
     English
FS
     Consumer Health
EM
     200009
     Entered STN: 20000928
     Last Updated on STN: 20000928
     Entered Medline: 20000921
CT
     Check Tags: Human; Male
     *Androgen Antagonists: TU, therapeutic use
      Estrogens: TU, therapeutic use
      Gonadorelin: AG, agonists
        Ketoconazole: TU, therapeutic use
      Orchiectomy
       *Prostatic Neoplasms: DT, drug therapy
      Prostatic Neoplasms: SU, surgery
RN
     33515-09-2 (Gonadorelin); 65277-42-1 (Ketoconazole)
     0 (Androgen Antagonists); 0 (Estrogens)
L141 ANSWER 4 OF 56
                        MEDLINE on STN
AN
     2000150750
                   MEDLINE
     PubMed ID: 10688042
DN
TI
     Efficacy of microtubule-active drugs followed by ketoconazole in human
     metastatic prostate cancer cell lines.
ΑU
     Blagosklonny M V; Dixon S C; Figg W D
CS
     Medicine Branch, Division of Clinical Sciences, National Cancer Institute,
     NIH, Bethesda, Maryland 20892, USA.
     Journal of urology, (2000 Mar) 163 (3) 1022-6.
SO
     Journal code: 0376374. ISSN: 0022-5347.
CY
     United States
DT
     Journal; Article; (JOURNAL ARTICLE)
LΑ
     English
FS
     Abridged Index Medicus Journals; Priority Journals
EM
     200003
ED
    Entered STN: 20000327
    Last Updated on STN: 20000327
     Entered Medline: 20000316
    PURPOSE: Once a relapse occurs following primary endocrine treatment,
AΒ
    metastatic prostate cancer is one of the most therapy-resistant human
    neoplasms. Ketoconazole is used for complete androgen deprivation, and
    recent data suggest it has direct activity against prostate cancer cells.
    MATERIALS AND METHODS: LNCaP, DU145, and PC3 cells, human prostate cancer
    cell lines, and HL60, a human leukemia cell line, were lysed and soluble
    proteins were harvested. Cells were plated in 96-well flat bottom plates
    and then exposed to the pharmacological agents, ketoconazole, vinblastine
    and paclitaxel. DNA synthesis was monitored by 3H-thymidine
    incorporation. RESULTS: We demonstrate that ketoconazole exerts a
    cytostatic effect on a panel of human prostate cancer cell lines, with
    IC50 of 4 to 5 microg./ml., 12 microg./ml., and 25 microg./ml. for LNCaP,
    PC3/PC3M, and DU145 cells, respectively. On the other hand, using
```

microtubule-active drugs, vinblastine and paclitaxel, we found that PC3M

CT

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and PC3 cells were more resistant than either DU145 or LNCap cells.
     resistance was associated with a lesser degree of Raf-1 and Bcl-2
     phosphorylation following exposure to microtubule-active drugs.
     Combinations of microtubule-active drugs with ketoconazole were a
     beneficial treatment in DU145 cancer cells. Furthermore, ketoconazole
     blocked recovery of all the prostate cancer cell lines following 24
     hours-pulse treatment with vinblastine. CONCLUSION: Pulse-administration
     of vinblastine followed by continuous administration of ketoconazole
     warrants investigation in the treatment of hormone-independent metastatic
     prostate cancer.
     Check Tags: Human; Male
     *Antineoplastic Agents: TU, therapeutic use
      Drug Screening Assays, Antitumor
       *Ketoconazole: TU, therapeutic use
      Microtubules: DE, drug effects
     *Paclitaxel: TU, therapeutic use
      Phosphorylation: DE, drug effects
       *Prostatic Neoplasms: DT, drug therapy
     *Prostatic Neoplasms: SC, secondary
      Tumor Cells, Cultured
     *Vinblastine: TU, therapeutic use
     33069-62-4 (Paclitaxel); 65277-42-1 (Ketoconazole); 865-21-4 (Vinblastine)
     0 (Antineoplastic Agents)
=> d all l142 1 2 4
L142 ANSWER 1 OF 45
                        MEDLINE on STN
     2000512716
                    MEDLINE
     PubMed ID: 11071217
     Androgen blockade in prostate cancer.
     Comment on: Lancet. 2000 Apr 29;355(9214):1491-8. PubMed ID: 10801170
     Labrie F; Candas B
     Lancet, (2000 Jul 22) 356 (9226) 341-2.
     Journal code: 2985213R. ISSN: 0140-6736.
     ENGLAND: United Kingdom
     Commentary
     Letter
     English
     Abridged Index Medicus Journals; Priority Journals
     200011
     Entered STN: 20010322
     Last Updated on STN: 20011004
     Entered Medline: 20001128
     Check Tags: Human; Male
     *Androgen Antagonists: TU, therapeutic use
        Cyproterone Acetate: TU, therapeutic use
     *Flutamide: TU, therapeutic use
     *Imidazoles: TU, therapeutic use
      Meta-Analysis
      Orchiectomy
       *Prostatic Neoplasms: DT, drug therapy
     13311-84-7 (Flutamide); 427-51-0 (Cyproterone Acetate); 63612-50-0
     (nilutamide)
     0 (Androgen Antagonists); 0 (Imidazoles)
L142 ANSWER 2 OF 45
                        MEDLINE on STN
     2000511502
                    MEDLINE
     PubMed ID: 11062379
     Neoadjuvant hormone therapy: the Canadian trials.
```

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ΑU
     Klotz L; Gleave M; Goldenberg S L
```

- Sunnybrook Health Science Center, University of Toronto, Toronto, Ontario, CS Canada.. Laurence.klotz@utoronto.ca
- Molecular urology, (2000 Fall) 4 (3) 233-7; discussion 239. Ref:

Journal code: 9709255. ISSN: 1091-5362.

United States

DT Journal; Article; (JOURNAL ARTICLE) General Review; (REVIEW) (REVIEW, TUTORIAL)

English LΑ

FS Priority Journals

EM200012

ED Entered STN: 20010322

Last Updated on STN: 20010322 Entered Medline: 20001207 AΒ

The Canadian Urologic Oncology Group has carried out three studies of neoadjuvant hormonal therapy (NHT) in prostate cancer. The first, a study of 3 months of cyproterone acetate (CPA) 100 mg TID in patients undergoing external-beam radiation therapy, showed a benefit with respect to time to biochemical progression. There are no survival or clinical progression data available from this study. The second study involved 3 months of CPA prior to radical prostatectomy compared with radical prostatectomy alone and enrolled 200 patients. The probability of biochemical progression at 36 months was similar in the two groups (CPA 40%; surgery alone 30%; P = 0.3233). More recently, we have carried out a randomized trial of 3 $_{
m V}$ 8 months of leuprolide plus flutamide prior to radical prostatectomy in 547 patients. Patients were stratified by clinical stage, Gleason grade, and serum prostate specific antigen (PSA) concentration. In the 3- and 8-month groups, presurgery PSA concentrations were <0.1 ng/mL in 35% v73%, and >0.3 ng/mL in 37% v 10%, respectively. In the 3- and 8-month groups, the positive margin rates were 17% and 5% and the organ-confined rates 71% and 91% (P < 0.01). One-year follow-up is now available on the entire cohort. Data regarding time to biochemical and clinical progression and overall and disease-specific survival will be required to determine whether this change in the pathologic findings translates into a patient benefit.

CT Check Tags: Human; Male

*Androgen Antagonists: TU, therapeutic use

*Antineoplastic Agents, Hormonal: TU, therapeutic use Antineoplastic Combined Chemotherapy Protocols: TU, therapeutic use Canada

Cyproterone Acetate: TU, therapeutic use

Disease Progression

Flutamide: TU, therapeutic use Leuprolide: TU, therapeutic use

Neoadjuvant Therapy

Prostate-Specific Antigen: BL, blood

Prostatectomy

*Prostatic Neoplasms: DT, drug therapy

Prostatic Neoplasms: PA, pathology Prostatic Neoplasms: TH, therapy Randomized Controlled Trials Survival Rate

13311-84-7 (Flutamide); 427-51-0 (Cyproterone Acetate); 53714-56-0 RN (Leuprolide)

0 (Androgen Antagonists); 0 (Antineoplastic Agents, Hormonal); 0 CN(Antineoplastic Combined Chemotherapy Protocols); EC 3.4.21.77 (Prostate-Specific Antigen)

```
L142 ANSWER 4 OF 45 MEDLINE on STN
```

- AN 2000394289 MEDLINE
- DN PubMed ID: 10925096
- TI Long-term neoadjuvant hormone therapy prior to radical prostatectomy: evaluation of risk for biochemical recurrence at 5-year follow-up.
- AU Gleave M E; La Bianca S E; Goldenberg S L; Jones E C; Bruchovsky N; Sullivan L D
- CS Division of Urology, University of British Columbia, Vancouver General Hospital, Vancouver, British Columbia, Canada.
- SO Urology, (2000 Aug 1) 56 (2) 289-94. Journal code: 0366151. ISSN: 1527-9995.
- CY United States
- DT Journal; Article; (JOURNAL ARTICLE)
- LA English
- FS Priority Journals
- EM 200008
- ED Entered STN: 20000824 Last Updated on STN: 20010521
- Entered Medline: 20000814

 AB OBJECTIVES: To assess the effects of 8 months of neoadjuvant therapy on pathologic stage and biochemical recurrence rates. METHODS: One hundred fifty-six men with clinically localized prostate cancer were treated with
- fifty-six men with clinically localized prostate cancer were treated with neoadjuvant combined androgen withdrawal therapy for 8 months prior to radical prostatectomy. Preoperative clinical stage, Gleason score, and serum prostate-specific antigen (PSA) levels were compared with treatment outcome (pathologic stage and PSA recurrence). RESULTS: PSA at diagnosis was 10 microg/L or higher in 36% with a mean of 11.5 microg/L. Clinical stage was Tlc in 18%, T2 in 74%, and T3a in 8%. Gleason score was 6 or lower in 76% and 7 or higher in 24%. Pathologic stage was T0 in 13%, T2 in 66%, T3 (specimen confined) in 13%, T3 (margin positive) in 6%, and TxN+ in 2%. Incidence of positive margins increased with clinical stage T3a versus organ-confined disease (25% versus 4%, P <0.05), pretreatment Gleason scores 7 or higher versus Gleason scores 6 or lower (11% versus 4%, P = NS), and pretreatment PSA levels higher than 10 microg/L compared with PSA levels lower than 10 microg/L (15% versus 0%, P <0.01). Overall PSA recurrence rate was 12.2% after a mean postoperative follow-up of 54 months. Risk of PSA recurrence increased with clinical stage (25% T3 versus 11% organ confined, P <0.01), pretreatment PSA (7% if PSA lower than 10 microg/L versus 21% if 10 microg/L or higher, P <0.02), Gleason score (9% if 6 or lower versus 22% if 7 or higher, P <0.02), and pathologic stage (6% of pT2, 24% of pT3M-, and 56% of pT3M+, P < 0.01). PSA recurrences occurred in 6% of patients with no adverse preoperative risk factors, 12% with any one of the high-risk factors, and 29% with any two of the high-risk factors. CONCLUSIONS: Risk of PSA recurrence after 8 months of neoadjuvant therapy is low after 5 years of follow-up and remains proportional to the presence of adverse preoperative risk factors. Prospective randomized studies are required to determine whether longer duration of neoadjuvant therapy reduces the risk of biochemical recurrence after radical prostatectomy.
- CT Check Tags: Human; Male

Adult

Aged

- *Androgen Antagonists: TU, therapeutic use
- *Antineoplastic Agents, Hormonal: TU, therapeutic use Combined Modality Therapy

Cyproterone Acetate: TU, therapeutic use Diethylstilbestrol: TU, therapeutic use

Drug Therapy, Combination

Flutamide: TU, therapeutic use

Follow-Up Studies

```
Leuprolide: TU, therapeutic use
       Lymph Node Excision
       Middle Aged
      *Neoadjuvant Therapy
       Postoperative Complications: EP, epidemiology
      *Prostatectomy
       Prostatic Neoplasms: DI, diagnosis
        *Prostatic Neoplasms: DT, drug therapy
      *Prostatic Neoplasms: SU, surgery
       Recurrence
      Treatment Outcome
      13311-84-7 (Flutamide); 427-51-0 (Cyproterone Acetate); 53714-56-0
RN
      (Leuprolide); 56-53-1 (Diethylstilbestrol)
CN
      0 (Androgen Antagonists); 0 (Antineoplastic Agents, Hormonal)
=> d all 1143 1 2 5
L143 ANSWER 1 OF 293
                          MEDLINE on STN
AN
     2002005232
                     MEDLINE
DN
     PubMed ID: 11194670
TI
      [Radical prostatectomy with broadened scope of indications - analysis of
     early experience].
     Radikalna prostatektomiia s razshireni pokazaniia - nachalen opit.
ΑU
     Chakarov S; Bechev R; Lazarov Z; Fachikov Ts; Rangelov S
     Government University Hospital "St Anna," Urologic Clinic, Medical
CS
     University, Sofia, Bulgaria.
SO
     Khirurgiia, (1999) 55 (3) 47-8.
     Journal code: 0376355. ISSN: 0450-2167.
CY
     Bulgaria
DТ
     Journal; Article; (JOURNAL ARTICLE)
LA
     Bulgarian
FS
     Priority Journals
EM
     200201
ED
     Entered STN: 20020121
     Last Updated on STN: 20020128
     Entered Medline: 20020123
CT
     Check Tags: Human; Male
      Acid Phosphatase: AN, analysis
      Acid Phosphatase: BL, blood
      Aged
      Androgen Antagonists: TU, therapeutic use
      Antineoplastic Agents, Hormonal: TU, therapeutic use
        Flutamide: TU, therapeutic use
      Goserelin: TU, therapeutic use
      Middle Aged
      Prostate-Specific Antigen: BL, blood
     *Prostatectomy: MT, methods
      Prostatic Neoplasms: DI, diagnosis
        Prostatic Neoplasms: DT, drug therapy
      Prostatic Neoplasms: SC, secondary
     *Prostatic Neoplasms: SU, surgery
     13311-84-7 (Flutamide); 65807-02-5 (Goserelin)
RN
     0 (Androgen Antagonists); 0 (Antineoplastic Agents, Hormonal); EC 3.1.3.2
CN
     (Acid Phosphatase); EC 3.4.21.77 (Prostate-Specific Antigen)
L143 ANSWER 2 OF 293
                         MEDLINE on STN
AN
     2001353116
                    MEDLINE
DN
     PubMed ID: 11114872
```

```
TI
     Neoadjuvant hormone therapy and radical radiotherapy for localized
     prostate cancer: poorer biochemical outcome using flutamide alone.
     Wilson K S; Ludgate C M; Wilson A G; Alexander A S
ΑU
     University of British Columbia, Vancouver, BC, Canada.
CS
     Canadian journal of urology, (2000 Oct) 7 (5) 1099-103.
     Journal code: 9515842. ISSN: 1195-9479.
CY
     Canada
DT
     Journal; Article; (JOURNAL ARTICLE)
LA
     English
FS
     Priority Journals
EM
     200106
     Entered STN: 20010625
     Last Updated on STN: 20010625
     Entered Medline: 20010621
AΒ
     Since a recent meta-analysis of non-steroidal anti-androgen therapy in
     metastatic prostate cancer concluded that survival was worse compared with
     medical or surgical androgen withdrawal, we analyzed our experience with
     flutamide monotherapy and other forms of neoadjuvant hormone therapy (NHT)
     prior to radiation therapy in clinically localized prostate cancer. A
     total of 45 patients received flutamide and 328 patients received other
     NHT. Flutamide patients had higher PSA levels at diagnosis and shorter
     duration of treatment, which could bias the results against flutamide
     monotherapy. Kaplan Meier analysis of PSA -- disease free survival showed
     significantly poorer outcome with flutamide monotherapy. Multivariate
     analysis supported this conclusion. Until equivalence to other forms of
     NHT is shown, we do not recommend flutamide monotherapy prior to radical
     radiation. A prospective randomized trial would be necessary to confirm
     this conclusion.
CT
     Check Tags: Comparative Study; Human; Male; Support, Non-U.S. Gov't
     *Adenocarcinoma: DT, drug therapy
      Adenocarcinoma: PA, pathology
     *Adenocarcinoma: RT, radiotherapy
     *Androgen Antagonists: TU, therapeutic use
     *Antineoplastic Agents, Hormonal: TU, therapeutic use
      Chi-Square Distribution
       *Flutamide: TU, therapeutic use
      Multivariate Analysis
      Neoadjuvant Therapy
      Neoplasm Staging
      Prostate-Specific Antigen: BL, blood
       *Prostatic Neoplasms: DT, drug therapy
      Prostatic Neoplasms: PA, pathology
     *Prostatic Neoplasms: RT, radiotherapy
      Radiotherapy Dosage
      Regression Analysis
RN
     13311-84-7 (Flutamide)
     0 (Androgen Antagonists); 0 (Antineoplastic Agents, Hormonal); EC
     3.4.21.77 (Prostate-Specific Antigen)
L143 ANSWER 5 OF 293
                         MEDLINE on STN
ΑN
     2001043137
                   MEDLINE
DN
     PubMed ID: 11095136
     A prospective randomized multicenter study of chlormadinone acetate versus
TI
     flutamide in total androgen blockade for prostate cancer.
     Ozono S; Okajima E; Yamaguchi A; Yoshikawa M; Iwai A; Moriya A; Yoshida K;
AU
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Department of Urology, Nara Medical University, Kashihara, Japan..

Japanese journal of clinical oncology, (2000 Sep) 30 (9) 389-96.

Samma S; Maruyama Y; Hirao Y

ozn-kkr@nmu-gw.naramed-u.ac.jp

Journal code: 0313225. ISSN: 0368-2811.

CS

SO

```
CY
     Japan
DT
     (CLINICAL TRIAL)
     Journal; Article; (JOURNAL ARTICLE)
     (MULTICENTER STUDY)
     (RANDOMIZED CONTROLLED TRIAL)
     English
T_1A
FS
     Priority Journals
ΕM
     200012
ED
     Entered STN: 20010322
     Last Updated on STN: 20010322
     Entered Medline: 20001207
AΒ
     BACKGROUND: A randomized multicenter study was conducted to investigate
     the efficacy of total androgen blockade (TAB) for patients with previously
     untreated prostate cancer using the steroidal anti-androgen chlormadinone
     acetate (CMA) and the non-steroidal anti-androgen flutamide. We also
     compared the liver dysfunction in these two arms. METHODS: From November
     1995 to October 1997, 71 patients were registered into this study and 70
     of them were eligible. RESULTS: There was no significant difference in
     the efficacy of TAB between CMA and flutamide at 24 weeks. The
     testosterone and prostate-specific antigen (PSA) levels in patients
     administered flutamide (Group II) increased significantly 3 days after the
     first dose of LH-RH analog, whereas no such increase was observed in
     patients administered CMA (Group I), indicating that CMA prevented the
     flare-up. Parameters of liver function, serum GOT and GPT levels, which
     were normal at the baseline, became abnormal in 30.0% and 35.3%,
     respectively, of patients in Group II. These figures were significantly
     higher than the corresponding figures of 6.3% and 12.5%, respectively, in
     Group I. When the degree of change in each of these parameters was
     analyzed, both GOT and GPT levels showed a significantly greater increase
     in Group II than in Group I. CONCLUSION: These results indicate that
     attention must be paid to changes in liver function during the
     administration of flutamide in patients with prostate cancer even if their
     baseline liver function is normal. It is also suggested that CMA may be
     better tolerated from the viewpoint of the drug effects on liver function.
CT
     Check Tags: Human; Male
     *Adenocarcinoma: DT, drug therapy
      Adenocarcinoma: PP, physiopathology
     *Androgen Antagonists: TU, therapeutic use
     *Antineoplastic Agents, Hormonal: TU, therapeutic use
     *Chlormadinone Acetate: AA, analogs & derivatives
     *Chlormadinone Acetate: TU, therapeutic use
     *Enzyme Inhibitors: TU, therapeutic use
       *Flutamide: TU, therapeutic use
      Liver: PP, physiopathology
      Prospective Studies
       *Prostatic Neoplasms: DT, drug therapy
      Prostatic Neoplasms: PP, physiopathology
RN
     13311-84-7 (Flutamide); 302-22-7 (Chlormadinone Acetate); 3114-44-1
     (chlormadinol acetate)
CM
     0 (Androgen Antagonists); 0 (Antineoplastic Agents, Hormonal); 0 (Enzyme
     Inhibitors)
=> d all l144 1-3
L144 ANSWER 1 OF 17
                        MEDLINE on STN
AN
    2000476033
                    MEDLINE
DN
    PubMed ID: 11026565
     1,25-Dihydroxyvitamin D3 decreases human prostate cancer cell adhesion and
TI
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migration.
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- AU Sung V; Feldman D
- CS Department of Medicine, Stanford University School of Medicine, CA 94305-5103, USA.
- NC DK42482 (NIDDK) T32 DK07217 (NIDDK)
- SO Molecular and cellular endocrinology, (2000 Jun) 164 (1-2) 133-43.

Journal code: 7500844. ISSN: 0303-7207.

- CY Ireland
- DT Journal; Article; (JOURNAL ARTICLE)
- LA English
- FS Priority Journals
- EM 200102
- ED Entered STN: 20010322 Last Updated on STN: 20010322
- Entered Medline: 20010208

 AB 1,25-Dihydroxyvitamin-D3 [1,25(OH)2D3], the active hormonal metabolite of vitamin D, acts through a specific nuclear receptor to inhibit proliferation and promote differentiation of several tumor cell types
- proliferation and promote differentiation of several tumor cell types including the LNCaP, DU145 and PC-3 prostate cancer cell lines as well as primary prostate tumor lines. 1,25 (OH) 2D3 can also decrease invasion of breast and prostate cancer cell lines in vitro. We confirm this latter finding in the DU145 and PC-3 prostate cancer cell lines, and further show that 1,25 (OH) 2D3 inhibits overall invasion, cell adhesion and migration to the basement membrane matrix protein laminin. These changes appear to be due in part to a 1,25 (OH) 2D3-induced decrease in expression of alpha6 and beta4 integrins, both of which are receptors for laminin and associated with increased migration and invasion of prostate cancer cells in vitro. Blocking function of these particular integrins with antibodies inhibits both adhesion and migration of the cells. Collectively, these data demonstrate that 1,25 (OH) 2D3, in addition to decreasing proliferation of tumor cells, can also inhibit prostate cancer cell invasion through
- modulation of select cell surface adhesion molecules.

 CT Check Tags: Human; Male; Support, Non-U.S. Gov't; Support, U.S. Gov't, Non-P.H.S.; Support, U.S. Gov't, P.H.S.
 - *Calcitriol: PD, pharmacology

Calcitriol: TU, therapeutic use

- *Calcium Channel Agonists: PD, pharmacology Calcium Channel Agonists: TU, therapeutic use
- Cell Adhesion: DE, drug effects
- *Cell Movement: DE, drug effects

*Prostatic Neoplasms: DT, drug therapy

- *Prostatic Neoplasms: PA, pathology
- Tumor Cells, Cultured
- RN 32222-06-3 (Calcitriol)
- CN 0 (Calcium Channel Agonists)
- L144 ANSWER 2 OF 17 MEDLINE on STN
- AN 2000168596 MEDLINE
- DN PubMed ID: 10706079
- TI A calcitriol analogue, EB1089, inhibits the growth of LNCaP tumors in nude mice.
- CM Comment in: Cancer Res. 2001 May 15;61(10):4294. PubMed ID: 11358859
- AU Blutt S E; Polek T C; Stewart L V; Kattan M W; Weigel N L
- CS Department of Molecular and Cellular Biology, Baylor College of Medicine, Houston, Texas 77030, USA.
- NC CA58204 (NCI) CA75337 (NCI)
- SO Cancer research, (2000 Feb 15) 60 (4) 779-82.

```
Journal code: 2984705R, ISSN: 0008-5472.
CY
     United States
DT
     Journal; Article; (JOURNAL ARTICLE)
LΑ
     English
FS
     Priority Journals
EM
     200003
ED
     Entered STN: 20000330
     Last Updated on STN: 20011025
     Entered Medline: 20000320
     Limited options for the treatment of prostate cancer have spurred the
AΒ
     search for new therapies. One innovative approach is the use of
     1alpha,25-dihydroxyvitamin D3 (calcitriol) analogues to inhibit cancer
     growth. We demonstrate here that the calcitriol analogue, EB1089,
     extensively inhibits the growth of LNCaP prostate cancer cells in culture
     and causes the cells to both accumulate in GO-G1 and undergo apoptosis.
     Importantly, we found that EB1089 inhibits the growth of LNCaP tumor
     xenografts in nude mice. Because of these antiproliferative properties in
     vivo, EB1089 is a potential new therapeutic agent for the treatment of
     prostate cancer.
CT
     Check Tags: Human; Male; Support, U.S. Gov't, P.H.S.
      Animals
     *Antineoplastic Agents: TU, therapeutic use
      Apoptosis: DE, drug effects
     *Calcitriol: AA, analogs & derivatives
        Calcitriol: TU, therapeutic use
      Calcium: BL, blood
      Cell Cycle: DE, drug effects
      Mice
      Mice, Nude
       *Prostatic Neoplasms: DT, drug therapy
      Prostatic Neoplasms: PA, pathology
      Tumor Cells, Cultured
RN
     134404-52-7 (seocalcitol); 32222-06-3 (Calcitriol); 7440-70-2 (Calcium)
     0 (Antineoplastic Agents)
L144 ANSWER 3 OF 17
                        MEDLINE on STN
AN
     2000118058
                    MEDLINE
DN
     PubMed ID: 10639196
ΤI
     Calcium, lycopene, vitamin D and prostate cancer.
CM
     Comment on: Prostate. 1999 Sep 1;40(4):261-8. PubMed ID: 10420155
ΑU
     Grant W B
SO
     Prostate, (2000 Feb 15) 42 (3) 243.
     Journal code: 8101368. ISSN: 0270-4137.
CY
     United States
DT
     Commentary
     Letter
LA
     English
FS
     Priority Journals
ΕM
     200002
     Entered STN: 20000309
     Last Updated on STN: 20000427
     Entered Medline: 20000223
CT
    Check Tags: Human; Male
     Anticarcinogenic Agents: TU, therapeutic use
     *Calcium: ME, metabolism
     *Carotenoids: TU, therapeutic use
     Diet
       Prostatic Neoplasms: DT, drug therapy
     Prostatic Neoplasms: EP, epidemiology
     *Prostatic Neoplasms: ET, etiology
```

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Prostatic Neoplasms: PC, prevention & control
       Vitamin D: ME, metabolism
        *Vitamin D: TU, therapeutic use
      1406-16-2 (Vitamin D); 36-88-4 (Carotenoids); 502-65-8 (lycopene);
 RN
      7440-70-2 (Calcium)
      0 (Anticarcinogenic Agents)
 CN
 => d all 1145 2 3 5
L145 ANSWER 2 OF 985
                          MEDLINE on STN
     2000507230
ΔN
                     MEDLINE
DN
     PubMed ID: 11056493
TI
     Exploitable mechanisms for the blockade of androgenic action.
ΑU
     Griffiths K; Denis L J
     Tenovus Cancer Research Centre, University of Wales College of Medicine,
CS
     Cardiff, Wales, UK.
SO
     Prostate. Supplement, (2000) 10 43-51. Ref: 50
     Journal code: 9003050. ISSN: 1050-5881.
     United States
CY
DТ
     Journal; Article; (JOURNAL ARTICLE)
     General Review; (REVIEW)
     (REVIEW, TUTORIAL)
LA
     English
     Priority Journals
FS
FΜ
     200011
ED
     Entered STN: 20010322
     Last Updated on STN: 20010322
     Entered Medline: 20001115
CT
     Check Tags: Human; Male
     *Androgen Antagonists: TU, therapeutic use
      Drug Therapy, Combination
      Enzyme Inhibitors: TU, therapeutic use
        Estrogens: TU, therapeutic use
      Finasteride: TU, therapeutic use
      Forecasting
      Intracellular Membranes: PH, physiology
       *Prostatic Neoplasms: DT, drug therapy
      Protein-Tyrosine Kinase: AI, antagonists & inhibitors
      Signal Transduction: PH, physiology
RN
     98319-26-7 (Finasteride)
CN
     0 (Androgen Antagonists); 0 (Enzyme Inhibitors); 0 (Estrogens); EC
     2.7.1.112 (Protein-Tyrosine Kinase)
L145 ANSWER 3 OF 985
                         MEDLINE on STN
ΑN
     2000507227
                    MEDLINE
DN
     PubMed ID: 11056490
TI
     Endocrine treatment: expected duration stage by stage.
ΑIJ
     Schroder F H
     Department of Urology, Academic Hospital and Erasmus University,
CS
     Rotterdam, The Netherlands.. vanalphen@urol.azr.nl
SO
     Prostate. Supplement, (2000) 10 26-31. Ref: 31
     Journal code: 9003050. ISSN: 1050-5881.
CY
     United States
DT
     Journal; Article; (JOURNAL ARTICLE)
     General Review; (REVIEW)
     (REVIEW, TUTORIAL)
LΑ
     English
FS
     Priority Journals
EM
     200011
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ED
     Entered STN: 20010322
      Last Updated on STN: 20010322
      Entered Medline: 20001115
 CT
      Check Tags: Human; Male
      *Androgen Antagonists: TU, therapeutic use
      Disease Progression
       *Estrogens: TU, therapeutic use
      Neoplasm Staging
      *Prostate-Specific Antigen: BL, blood
      *Prostatectomy
         Prostatic Neoplasms: DT, drug therapy
      Prostatic Neoplasms: IM, immunology
      *Prostatic Neoplasms: PA, pathology
      Prostatic Neoplasms: SU, surgery
     *Prostatic Neoplasms: TH, therapy
      Time Factors
     0 (Androgen Antagonists); 0 (Estrogens); EC 3.4.21.77 (Prostate-Specific
CN
     Antiqen)
L145 ANSWER 5 OF 985
                          MEDLINE on STN
     2000468915
                    MEDLINE
AN
DN
     PubMed ID: 11022718
TI
     Revaluation of estrogen therapy on prostate cancer.
ΑU
     Takezawa Y; Kobayashi M; Yamanaka H
CS
     Department of Urology, Isesaki Municipal Hospital.
SO
     Nippon rinsho. Japanese journal of clinical medicine, (2000 Jul)
     58 Suppl 223-7. Ref: 15
     Journal code: 0420546. ISSN: 0047-1852.
CY
     Japan
DT
     Journal; Article; (JOURNAL ARTICLE)
     General Review; (REVIEW)
     (REVIEW LITERATURE)
     Japanese
LA
FS
     Priority Journals
EM
     200012
     Entered STN: 20010322
ED
     Last Updated on STN: 20010322
     Entered Medline: 20001212
     Check Tags: Human; Male
CT
      Antineoplastic Agents, Hormonal: TU, therapeutic use
        Diethylstilbestrol: TU, therapeutic use
       *Estrogens: TU, therapeutic use
        Estrogens, Non-Steroidal: TU, therapeutic use
     *Neoplasms, Hormone-Dependent: DT, drug therapy
       *Prostatic Neoplasms: DT, drug therapy
RN
     56-53-1 (Diethylstilbestrol)
CN
     0 (Antineoplastic Agents, Hormonal); 0 (Estrogens); 0 (Estrogens,
     Non-Steroidal)
=> d all l146 1-3
L146 ANSWER 1 OF 97
                        MEDLINE on STN
AN
     2002005232
                    MEDLINE
DN
     PubMed ID: 11194670
     [Radical prostatectomy with broadened scope of indications - analysis of
TT
     early experience].
     Radikalna prostatektomiia s razshireni pokazaniia - nachalen opit.
ΑU
     Chakarov S; Bechev R; Lazarov Z; Fachikov Ts; Rangelov S
     Government University Hospital "St Anna," Urologic Clinic, Medical
CS
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University, Sofia, Bulgaria.
SO
     Khirurgiia, (1999) 55 (3) 47-8.
     Journal code: 0376355. ISSN: 0450-2167.
CY
     Bulgaria
DT
     Journal; Article; (JOURNAL ARTICLE)
LA
     Bulgarian
FS
     Priority Journals
EM
     200201
ED
     Entered STN: 20020121
     Last Updated on STN: 20020128
     Entered Medline: 20020123
     Check Tags: Human; Male
CT
      Acid Phosphatase: AN, analysis
      Acid Phosphatase: BL, blood
      Aged
      Androgen Antagonists: TU, therapeutic use
      Antineoplastic Agents, Hormonal: TU, therapeutic use
      Flutamide: TU, therapeutic use
        Goserelin: TU, therapeutic use
      Middle Aged
      Prostate-Specific Antigen: BL, blood
     *Prostatectomy: MT, methods
      Prostatic Neoplasms: DI, diagnosis
        Prostatic Neoplasms: DT, drug therapy
      Prostatic Neoplasms: SC, secondary
     *Prostatic Neoplasms: SU, surgery
     13311-84-7 (Flutamide); 65807-02-5 (Goserelin)
RN
     0 (Androgen Antagonists); 0 (Antineoplastic Agents, Hormonal); EC 3.1.3.2
CN
     (Acid Phosphatase); EC 3.4.21.77 (Prostate-Specific Antiqen)
L146 ANSWER 2 OF 97
                        MEDLINE on STN
                    MEDLINE
     2001155404
AN
     PubMed ID: 11168686
DN
тT
     Prostate cancer with multiple lung metastases in a hemodialysis patient.
     Hayakawa K; Matsumoto M; Aoyagi T; Miyaji K; Hata M
ΑU
CS
     Department of Urology, Tokyo Dental College, Ichikawa General Hospital,
     Chiba, Japan.. hayakawa@tdc.ac.jp
SO
     International journal of urology : official journal of the Japanese
     Urological Association, (2000 Dec) 7 (12) 464-6.
     Journal code: 9440237. ISSN: 0919-8172.
CY
     Australia
DТ
     (CASE REPORTS)
     Journal; Article; (JOURNAL ARTICLE)
LA
     English
FS
     Priority Journals
EM
     200103
     Entered STN: 20010404
ED
     Last Updated on STN: 20010404
     Entered Medline: 20010322
     In hemodialysis patients, few cases of prostate cancer have been reported
AB
     until recently. We present a case of prostate cancer with multiple lung
     metastases in a chronic hemodialysis patient. A 65-year-old Japanese man
     who had maintained hemodialysis for 5 years was referred to our hospital
     with multiple metastatic lung tumors. Serum prostate tumor markers were
     highly elevated although his plasma testosterone level was within the
     normal range. A transrectal needle prostate biopsy confirmed a histologic
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diagnosis of moderately differentiated adenocarcinoma. Androgen blockade therapy was very effective as evidenced by a quick decrease of serum tumor markers. The follow-up computed tomography scan of the chest performed 3

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months later showed a complete disappearance of the coin lesions. early detection of prostate cancer in hemodialysis patients is difficult because of a lack of urologic symptoms, which indicate the importance of periodic screening by serum tumor markers. Combined androgen blockade is effective even in hemodialysis patients. However, close follow up is necessary because long-term results and prognoses are still unknown. Check Tags: Human; Male Adenocarcinoma: DT, drug therapy *Adenocarcinoma: PA, pathology Adenocarcinoma: RA, radiography *Adenocarcinoma: SC, secondary Androgen Antagonists: TU, therapeutic use Antineoplastic Agents, Hormonal: TU, therapeutic use Drug Therapy, Combination Flutamide: TU, therapeutic use Goserelin: TU, therapeutic use Lung Neoplasms: RA, radiography *Lung Neoplasms: SC, secondary Prostatic Neoplasms: DT, drug therapy *Prostatic Neoplasms: PA, pathology Radiography, Thoracic *Renal Dialysis Tomography, X-Ray Computed 13311-84-7 (Flutamide); 65807-02-5 (Goserelin) 0 (Androgen Antagonists); 0 (Antineoplastic Agents, Hormonal) L146 ANSWER 3 OF 97 MEDLINE on STN MEDLINE 2001006516 PubMed ID: 11010743 Goserelin and locally advanced prostate cancer: new indication. Pros and Anonymous Prescrire international, (2000 Jun) 9 (47) 75-6. Journal code: 9439295. ISSN: 1167-7422. Journal; Article; (JOURNAL ARTICLE) English Health Technology 200009 Entered STN: 20010223 Last Updated on STN: 20010223 Entered Medline: 20000922 (1) Goserelin, a GnRH agonist, has a new licensed indication in France, as an adjuvant to external radiotherapy for locally advanced prosate cancer. (2) The clinical file in this indication includes two trials of satisfactory methodological quality comparing radiotherapy + goserelin with radiotherapy alone. (3) In these trials the radiotherapy + goserelin combination increased the specific-symptom-free survival time. (4) In one trial goserelin caused endocrine disorders in 19% of patients. There were also more cases of urinary incontinence (13% in absolute values) among patients receiving the radiotherapy + goserelin combination. Furthermore, goserelin almost always causes impotence and reduced libido. Check Tags: Comparative Study; Human; Male Antineoplastic Agents, Hormonal: AD, administration & dosage Antineoplastic Agents, Hormonal: AE, adverse effects Antineoplastic Agents, Hormonal: TU, therapeutic use Clinical Trials Endocrine Diseases: CI, chemically induced

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France
      Gonadorelin: AG, agonists
      *Goserelin
      Goserelin: AD, administration & dosage
      Goserelin: AE, adverse effects
        Goserelin: TU, therapeutic use
      Impotence: CI, chemically induced
      Libido: DE, drug effects
     *Prostatic Neoplasms
        Prostatic Neoplasms: DT, drug therapy
      Prostatic Neoplasms: RT, radiotherapy
      Treatment Outcome
      Urinary Incontinence: CI, chemically induced
RN
     33515-09-2 (Gonadorelin); 65807-02-5 (Goserelin)
     O (Antineoplastic Agents, Hormonal)
=> d all 1147 2 3 5
L147 ANSWER 2 OF 11
                        MEDLINE on STN
AN
     90282023 MEDLINE
DN
     PubMed ID: 2191570
     Clinical studies on endocrine therapy of prostatic carcinoma (2):
TI
     Prognosis of patients with prostatic carcinoma given endocrine therapy,
     and analyses of causes of death and side effects of endocrine therapy.
ΑU
     Kumamoto Y; Tsukamoto T; Umehara T; Shimazaki J; Fuse H; Oshima H;
     Takeuchi H; Yoshida O; Okada K; Saito Y; +
CS
     Department of Urology, Sapporo Medical College.
SO
     Hinyokika kiyo. Acta urologica Japonica, (1990 Mar) 36 (3)
     285-93.
     Journal code: 0421145. ISSN: 0018-1994.
CY
     Japan
DТ
     (CLINICAL TRIAL)
     Journal; Article; (JOURNAL ARTICLE)
     (MULTICENTER STUDY)
LA
     Japanese
FS
     Priority Journals
EM
     199007
ED
     Entered STN: 19900824
     Last Updated on STN: 19900824
     Entered Medline: 19900719
    Of 572 patients with prostatic carcinoma, 497 received endocrine therapy
AR
     as the initial treatment. These patients were surveyed in a cooperative
     research study by members from five universities. Prognosis, causes of
     death and side effects of estrogen therapy were studied. The prognosis of
     patients who had received endocrine therapy became worse, as the stage
    progressed. The prognosis of those who had received a combination of
    estrogen therapy with castration tended to be better than that of those
    who had received estrogen therapy alone. Similarly, the prognosis of
    those who had received a combination of progesterone therapy with
    castration tended to be better than that of those who had had progesterone
    therapy alone. No relationship was found between estrogen doses (low,
    medium and high) and prognosis, although a precise comparison among the
    three could not be made because of the smaller number of patents with low
    doses. A high dose of estrogen may not always be the indication, rather a
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medium dose such as 300 mg diethylstilbestrol diphosphate may be

clinically appropriate. The cause of death could be identified in 303 patients who had received endocrine therapy. Cancer-related death was the most frequent (63.7%), and cardio- or cerebrovascular death accounted for only 14.2% of the cases. When this analysis was confined to the patients

who had received estrogen therapy, estrogen administration seemed to be the cause of cardio- or cerebrovascular death of 16.1% of the patients. Daily dosing of estrogen was not definitely related to the incidence, or the interval to cardio- or cerebrovascular death. However, among the patients who had died of cardio- or cerebrovascular disease, 50% of the patients who had received a medium or high dose of estrogen tended to die within two years after treatment, while 50% of those who had received a low dose died within three years. Check Tags: Human; Male; Support, Non-U.S. Gov't Cause of Death English Abstract Estrogens: AE, adverse effects *Estrogens: TU, therapeutic use Japan: EP, epidemiology Multicenter Studies *Neoplasms, Hormone-Dependent: DT, drug therapy Neoplasms, Hormone-Dependent: EP, epidemiology Neoplasms, Hormone-Dependent: MO, mortality Progesterone: AE, adverse effects *Progesterone: TU, therapeutic use Prognosis *Prostatic Neoplasms: DT, drug therapy Prostatic Neoplasms: EP, epidemiology Prostatic Neoplasms: MO, mortality 57-83-0 (Progesterone) 0 (Estrogens) L147 ANSWER 3 OF 11 MEDLINE on STN MEDLINE 89382122 PubMed ID: 2570857 A new approach to prostate cancer. Ito Y Z; Nakazato Y; Petrow V College of Medical Care and Technology, Gunma University, Department of Pathology, Gunma University School of Medicine, Japan. Journal of pharmacy and pharmacology, (1989 Jul) 41 (7) 488-9. Journal code: 0376363. ISSN: 0022-3573. ENGLAND: United Kingdom Journal; Article; (JOURNAL ARTICLE) English Priority Journals 198910 Entered STN: 19900309 Last Updated on STN: 19950206 Entered Medline: 19891020 Growth of androgen-dependent human prostatic adenocarcinoma implanted in the nude mouse (Honda tumour), is inhibited by 6-methyleneprogesterone. This steroid is a potent inhibitor of both rat and human prostatic 5 alpha-reductase in-vitro. In-vivo, at the studied dose level, it reduces metabolic conversion of testosterone to dihydrotestosterone with minimal effects upon circulating LH and testosterone. These data support the hypothesis that dihydrotestosterone and not testosterone is the main trophic androgen of the human prostatic neoplasm. Check Tags: Human; Male; Support, Non-U.S. Gov't *Adenoma: DT, drug therapy

Adenoma: PP, physiopathology Animals Disease Models, Animal Mice Mice, Nude Neoplasm Transplantation

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Organ Weight: DE, drug effects
      *Progesterone: AA, analogs & derivatives
        Progesterone: TU, therapeutic use
      Prostate: DE, drug effects
       *Prostatic Neoplasms: DT, drug therapy
      Prostatic Neoplasms: PP, physiopathology
       Seminal Vesicles: DE, drug effects
     19457-57-9 (6-methylene-4-pregnene-3,20-dione); 57-83-0 (Progesterone)
RN
L147 ANSWER 5 OF 11
                         MEDLINE on STN
AN
     80229109
                  MEDLINE
DN
     PubMed ID: 6156222
TI
     Treatment of metastatic bone cancer.
ΑU
     Fukuma H
SO
     Nippon Seikeigeka Gakkai zasshi, (1980 Apr) 54 (4) 403-11.
     Journal code: 0413716. ISSN: 0021-5325.
CY
     Japan
DT
     Journal; Article; (JOURNAL ARTICLE)
LA
     Japanese
FS
     Priority Journals
EM
     198009
ED
     Entered STN: 19900315
     Last Updated on STN: 19900315
     Entered Medline: 19800923
CT
     Check Tags: Female; Human; Male
      Adult
      Aged
      Androgens: TU, therapeutic use
     Bone Neoplasms: DT, drug therapy *Bone Neoplasms: SC, secondary
      Bone Neoplasms: SU, surgery
      Breast Neoplasms: DT, drug therapy
      Breast Neoplasms: SU, surgery
      Estrogens: TU, therapeutic use
      Fracture Fixation, Internal
      Laminectomy
      Middle Aged
      Palliative Care
        Progesterone: TU, therapeutic use
        Prostatic Neoplasms: DT, drug therapy
      Prostatic Neoplasms: SU, surgery
     57-83-0 (Progesterone)
RN
CN
     0 (Androgens); 0 (Estrogens)
=> d all l148 1 3 4
L148 ANSWER 1 OF 107
                         MEDLINE on STN
     2002341685
ΑN
                   MEDLINE
DN
     PubMed ID: 12084334
TI
     Neoadjuvant hormone therapy before radical prostatectomy does not improve
     disease-specific survival.
ΑU
     Steiner M S
CS
     Department of Urology, University of Tennessee, Memphis, 956 Court Avenue,
     Room H216, Memphis, TN 38163, USA.. Msteiner@utmem.edu
SO
     Current urology reports, (2000 May) 1 (1) 7-8.
     Journal code: 100900943. ISSN: 1527-2737.
CY
     United States
DT
     Journal; Article; (JOURNAL ARTICLE)
LΆ
     English
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FS
      Priority Journals
 EM
      200302
 ED
      Entered STN: 20020627
      Last Updated on STN: 20030226
      Entered Medline: 20030225
 CT
      Check Tags: Human; Male
      *Antineoplastic Agents, Hormonal: TU, therapeutic use
       Chemotherapy, Adjuvant
        *Leuprolide: TU, therapeutic use
      Preoperative Care
      *Prostatectomy
        *Prostatic Neoplasms: DT, drug therapy
      *Prostatic Neoplasms: MO, mortality
      Prostatic Neoplasms: SU, surgery
      Survival Rate
RN
     53714-56-0 (Leuprolide)
     0 (Antineoplastic Agents, Hormonal)
CN
L148 ANSWER 3 OF 107
                         MEDLINE on STN
ΑN
     2001110504
                    MEDLINE
DN
     PubMed ID: 11096250
     Expression of estrogen receptor alpha and beta mRNAs in prostate cancers
TI
     treated with leuprorelin acetate.
ΑU
     Maruyama S; Fujimoto N; Asano K; Ito A; Usui T
     Department of Cancer Research, Research Institute for Radiation Biology
CS
     and Medicine (RIRBM), Hiroshima University, Hiroshima, Japan.
     European urology, (2000 Nov) 38 (5) 635-9.
SO
     Journal code: 7512719. ISSN: 0302-2838.
CY
     Switzerland
     Journal; Article; (JOURNAL ARTICLE)
DT
     English
LΑ
FS
     Priority Journals
EM
     200102
ED
     Entered STN: 20010322
     Last Updated on STN: 20010322
     Entered Medline: 20010202
     OBJECTIVE: The discovery of a novel estrogen receptor (ER), ER-beta, has
AΒ
     given rise to new possibilities regarding estrogen's roles in the
     prostate. Although ER-beta is reported to be expressed preferentially in
     the rat prostate, its expression in the human prostate and relationship to
     cancer development has not been investigated. Thus the purpose of the
     study was to examine mRNA levels of ER-alpha and ER-beta in benign
     prostatic hyperplasia and prostate carcinoma. METHODS: Samples of 15
     prostate cancers obtained at radical prostatectomy were examined. All the
     patients had been maintained on androgen withdrawal therapy for at least 3
     months. ER-alpha and ER-beta mRNAs were measured with a competitive PCR
     technique. RESULTS: Both ER-alpha and ER-beta mRNAs were detected in all
     of the prostate cancer tissues examined, as well as in PC3 and LNCap
     cells, although the levels varied among specimens. Interestingly, both
     types were significantly decreased in cases with lymph node metastasis.
     However, there was no correlation between ER mRNA levels and any other
     clinicopathological parameters. CONCLUSIONS: (1) Both ER-alpha and
     ER-beta mRNAs are expressed in prostate cancer and (2) expression of ER
    mRNA may not be related to cancer progression but may be negatively
    correlated with metastasis.
CT
    Check Tags: Human; Male; Support, Non-U.S. Gov't
     Aged
     Aged, 80 and over
     *Antineoplastic Agents, Hormonal: TU, therapeutic use
     *Gene Expression Regulation, Neoplastic
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*Leuprolide: TU, therapeutic use
      Middle Aged
     *Prostatic Hyperplasia: GE, genetics
        *Prostatic Neoplasms: DT, drug therapy
     *Prostatic Neoplasms: GE, genetics
     *RNA, Messenger: BI, biosynthesis
     *Receptors, Estrogen: GE, genetics
RN
     53714-56-0 (Leuprolide)
CN
     0 (Antineoplastic Agents, Hormonal); 0 (RNA, Messenger); 0 (Receptors,
     Estrogen); 0 (estrogen receptor alpha); 0 (estrogen receptor beta)
L148 ANSWER 4 OF 107
                          MEDLINE on STN
     2001029973
ΑN
                    MEDLINE
DN
     PubMed ID: 10887633
TI
     Leuprolide implant approved for once-yearly palliative treatment of
     advanced prostate cancer.
ΑU
     Anonymous
SO
     Oncology (Williston Park, N.Y.), (2000 Jun) 14 (6) 828, 830.
     Journal code: 8712059. ISSN: 0890-9091.
CY
     United States
     News Announcement
DТ
_{\rm LA}
     English
FS
     Priority Journals
EΜ
     200011
ED
     Entered STN: 20010322
     Last Updated on STN: 20010322
     Entered Medline: 20001121
CT
     Check Tags: Human; Male
     *Antineoplastic Agents, Hormonal: AD, administration & dosage
      Antineoplastic Agents, Hormonal: AE, adverse effects
      Antineoplastic Agents, Hormonal: TU, therapeutic use
      Drug Approval
      Drug Implants
     *Leuprolide: AD, administration & dosage
      Leuprolide: AE, adverse effects
        Leuprolide: TU, therapeutic use
      Palliative Care
       *Prostatic Neoplasms: DT, drug therapy
      United States
     United States Food and Drug Administration
RN
     53714-56-0 (Leuprolide)
CN
     0 (Antineoplastic Agents, Hormonal); 0 (Drug Implants)
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